



J. H. Riley

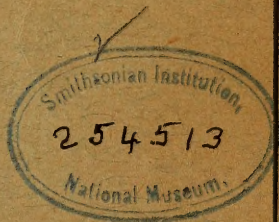
Vol. III.

Part I.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st JANUARY, 1917.



EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.
A. M. MORGAN, M.B., CH.B.
S. A. WHITE, M.B.O.U.
F. R. ZIETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd.,
Grenfell Street, Adelaide.

CONTENTS.

	PAGE
The South Australian Ornithological Association	5
Order Passeriformes, Family Dicaeidae, Genus Pardalotinus.	8
Field Notes on Acanthornis Magnus (Gld.) Scrub Tit or Great Tit. Edwin Ashby.	10
Birds of the North and North-West of Australia No. 9). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	12
Notes on Hatching of Cuckoo and Wren. J. W. Mellor.	18
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	19



— THE —

South Australian Ornithologist.

VOL. III.]

1ST JANUARY, 1917.

[PART 1.

The South Australian Ornithological Association.

On 29th September, 1916, a monthly meeting was held at the Royal Society Rooms, North Terrace, Adelaide, at which Dr. A. M. Morgan presided.

Mr. H. A. Behrens, of Flinders Street, Adelaide, was duly elected a member.

The Secretary read a letter from the Secretary of the Hon. Commissioner of Crown Lands, intimating that vigorous efforts were being made to put a stop to the destruction of Swans on the lower Murray and Lakes, and for this purpose it was intended to appoint a caretaker in the district to prevent trespassing or shooting on the holdings adjoining the River.

Mr. T. P. Belchambers, of Humbug Scrub, exhibited an interesting series of ducks' eggs, showing results of experiments made by him in the hybridisation of the Black Duck (*Anas superciliosa rogersi*) and Indian Pekin Domestic Ducks.

The same gentleman also reported having observed the following birds at Humbug Scrub during the month of September, which are unusual for the locality.

White Cockatoo (*Cacatoes galerita rosinae*).

Black Cockatoos (*Calyptorhynchus funereus whiteae*).

Black-fronted Dotterels (*Elseya melanops*).

Nests of—

Hooded Robin (*Melanodryas cucullata vigorsii*).

Southern White-throated Tree Creeper (*Climactertis leucophaca griseescens*).

Bearded Honey-eater (*Meliornis novae-hollandiae subasimilis*).

Greenie (*Ptilotula penicillata whitei*).

Babbler (*Morganornis superciliosus*).
were also observed near his homestead.

Dr. A. M. Morgan noted the Bottle Martin (*Lagenoplastes ariel*), nesting at Coromandel Valley on September 18th, Wood Swallow (*Pseudartamus cyanopterus*), Yellow-rumped Diamond Bird (*Pardalotus punctatus xanthopygus*), and the Restless Flycatcher (*Seisura inquieta*) building, and the Shrike Thrush (*Colluricincla harmonica*) flying with young.

The birds for discussion for the evening were Flycatchers, (Mathews List, No. 493/502), and the specimens were exhibited by Mr. F. R. Zietz from the S.A. Museum collection.

OCTOBER 27TH, 1916.

A monthly meeting was held at which Dr. A. M. Morgan presided.

Bird protection matters came under discussion, and were referred to the Fauna and Flora Protection Society. Mr. J. W. Mellor reported having seen several young broods of the Noisy Minah (*Myzantha garrula*) at Lockleys lately. Messrs. E. Ashby and F. Parsons exhibited a small collection of skins taken at Port Germein and Nackara during the previous month. Some of the birds exhibited were *Malurus melanotus whitei* (White's turquoise wren), *Leggeornis lamberti assimilis* (Southern blue-breasted wren), *Poodytes gramineus dubius* (Southern Grass bird), *Myzantha flavigula* (Yellow-throated Minah), *Lichenostomus plumulus ethelae* (Southern yellow-plumed honey eater), *Falcunculus frontatus flavigulus* (Shrike Tit), *Geopelia placida tranquilla* (Eastern ground dove), *Psephotus varius rosinæ* (Southern many-coloured parrot), *Owenavis osculans* (Black-eared cuckoo), *Lewinornis rufiventris inornatus* (Southern rufous breasted thickhead), *Zonifer tricolor* (Black-breasted plover), *Spiloglaux boobook* (Boobook Owl), *Barnardius barnardi whitei* (South Australian Mallee Parrot).

NOVEMBER 24th, 1916.

A monthly meeting was held, at which Mr. A. G. Edquist presided. Mr. F. R. Zietz reported having seen some of our native birds feeding their young in the Botanic Gardens this season, among others the Boobook Owl (*Spiloglaux boobook*), Black-tailed Native Hen (*Microtribonyx neutralis whitei*), Grey Shrike Thrush (*Colluricincla harmonica*). A communication was tabled by Dr. Morgan as to the likelihood of the imported sparrow (*Passer domesticus*) following the East-West Railway line into Western Australia from Port Augusta. Mr. Weidenbach remarked that he had seen the sparrows about 200 miles west of Port Augusta, on the line of construction. The matter was allowed to stand over till next meeting. Mr. J. W. Mellor reported having seen several flocks of Shell parrots (*Melopsittacus undulatus*) at Lockleys during the month, the same member exhibited a skin each of the Mallee parrot (*Barnardius barnardi*) and the pale yellow parrot (*Platyercus flaveolus innominatus*), both specimens from the River Murray above Morgan. A large collection of bird skins from the Cooper's Creek district, was exhibited by Capt. S. A. White.

An outline of the country collected over by the Museum Expedition was given, then a list of the birds observed, the speaker stated that one new bird at least would be the outcome of the trip, but on the whole he was disappointed with the few species of birds met with, about 107. Emus were not met with although their tracks were seen in the swampy ground. Quail were only represented by the little quail (*Austroturnix velox*), the spotted-shouldered dove (*Stictopeleia cuneata*) was met with, the crested pigeon (*Ocyphaps lophotes*) was not nearly so numerous as further north.

The native hen (*Microtribonyx ventralis*) was only seen upon two occasions, hoary headed grebe (*Poliocephalus poliocephalus*), and the Caspian tern (*Hydroprogne tschgrava strenua*) were seen upon the Cooper. The Crested Tern (*Thalasseus bergii pelecyanoides*) was observed at Lake Harry, and the Silver Gull (*Bruchigavia novaehollandiae*) was also seen. Dotterels of several species were met with, White-headed Stilts (*Himantopus leucocephalus*) as well as the red-necked Avocets (*Recurvi-*

rostra novae-hollandiae) were met with upon the swamps. Cranes of several species were seen, including the fine "Native" companion or Australian Crane (*Mathewsia rubicunda*). Ducks were scarce. The common grey teal, the pink-eared duck, and Tennant's maned goose, were all of this family met with. The wedge-tailed eagle (the largest in the world) was unfortunately being destroyed very fast by poison, and very few living examples were seen. Little eagles and whistling eagles were numerous, besides other members of the hawk family. Boobook, winking and masked owls, were met with, the pink cockatoo was only met with once, but the bare-eyed and rose-breasted variety were very plentiful, parrots were not numerous with the exception of shell parrots, which were in thousands, swallows of three or four species were plentiful. The rare desert-chat (*Ashbyia lovensis*) was taken as well as its eggs, which are new to science. It was stated that there were several items new to the science of ornithology to be described. The chairman congratulated the speaker upon the work accomplished, and upon his safe return.

Order Passeriformes, Family Dicaeidae, Genus Pardalotinus.

Pardalotinus striatus subaffinis—Striped Diamond bird.

Description—Upper Surface.—Forehead and crown of the head deep black, nape black, each feather with a narrow stripe of white down the centre; lores black bordered above by a broad stripe of orange yellow passing to the centre of the brow followed by a broad streak of white; ear coverts black stippled with white; back, grey gradually changing to buff on the rump and upper tail coverts.

Under Surface—Chin, throat and upper breast bright yellow, bordered on the sides of the neck by white; breast and abdomen white; flanks greenish yellow fading upwards and backwards to buff; thighs buff; under tail coverts pale buff.

Wing—Primaries black, all except the second with the outer webs margined with white, the white margins becoming broader and shorter towards the carpus, all are lightly tipped with white, the inner webs of all are broadly margined with greyish white. Secondaries black broadly tipped with

white, and the outer webs near the base margined with reddish brown; upper wing coverts black, stippled on the carpus with dull yellow, spurious wing, black tipped with bright vermilion.

Tail—Black, the inner webs tipped with white, the spots becoming larger from the centre outwards.

Iris—Brown.

Bill—Black.

Legs and feet—Greyish Brown.

Total length (of skin) 92 m.m.

Wing—65 m.m.

Tail—32 m.m.

Culmen—7 m.m.

The measurements are the average of seven specimens, four males, and three females. The female differs from the male only in the colour of the bill, which has the base of the lower mandible light horn colour, and the rest of the bill of a less deep black than in the male. Specimens from various parts of South Australia do not differ in colour, except one from Glen Ferdinand, Musgrave Ranges, which is lighter coloured in all its markings.

Distribution—The whole of South Australia.

Habits—This bird is an inhabitant of the gum trees, it is never found in parts of the country where these do not grow.

The larger gums are perhaps preferred, but they are not uncommon in quite small mallee scrub. Formerly they were common in the park lands about the city, and even now an occasional bird may be heard in the Botanic Park. As a rule they go about singly, but sometimes in the breeding season a pair may be seen together searching the leaves for food. They are not easily frightened, and if one keeps still, will go on feeding within a few feet of one's hand, hence their disappearance about the city, for their confiding nature makes them an easy prey to the boy with a shanghai.

Flight—Straight and rapid.

Food—Consists entirely of insects, which they gather from the leaves of the gum trees, they assist greatly in keeping the gum leaves free of scale.

Song—Two or three notes, monotonously repeated resembling the words Whit-i-chute, by which name they are known in some parts of Australia.

Nest—An open, cup-shaped structure usually placed in the hollow of a gum tree, the hollow chosen is usually in a thick limb, with a very small opening. The nest is built of dried grass stems with occasionally a strip or two of bark. They sometimes drill a hole for themselves in the bank, or dig out the mortar between the stones of an old building, and occasionally take possession of the old nests of the fairy martin. In the courting season they have a peculiar habit of sitting in pairs on a bare twig, and sway the body from side to side, with the wings half extended calling all the time. The nesting season extends from September to December.

Eggs—Three or four, pure white, the thick end very rounded, and the thin end coming to a blunt point.

A clutch of four eggs taken from a hole in a gum tree at the R. Finniss measured in c.m. 1. 1.80 x 1.40 2. 1.80 x 1.50 3. 1.80 x 1.50. 4. 1.75 x 1.40.

A nest taken at Kallioota in the banks of the Willochra creek in August 22nd, 1912, had a tunnel 18 inches long sloping slightly upwards to the nest chamber which was circular, 5 inches in diameter and 4 inches high. The outside measurement of the nest was 5 x 5 inches x 3 inches high. The egg cavity was $2\frac{1}{4}$ inches x 1 inch deep. It contained three slightly incubated eggs.

Field Notes on *Acanthornis Magnus* (Gld.) Scrub Tit or Great Tit.

By Edwin Ashby, M.B.O.U., etc.

On the occasion of my recent trip to Tasmania I paid a visit to a selected treefern gully, I think it is called Horsnail's Creek, at the back of Mt. Wellington, where in January, 1913, I found two nests of the year of *Acanthornis magnus*, these nests are now in the Adelaide Museum. At that date breeding was apparently over.

This year on September 29th I hoped to find the birds nesting, but was evidently too early.

I found one nest of the previous season in the same situation as those found in 1913, viz. in the hanging down dead fronds of a tree fern. The nests are in structure typical seri-

cornis nests, except that they are chiefly composed of portions of dead tree fern fronds and roughly, but cleverly, so built in between the hanging fronds of the tree fern that the weight of the fronds keeps the nest in position. Unless the greatest care is taken the nest drops to the ground as soon as the fronds are parted, showing that no attempt is made to attach the nest to the fronds, but trust is put in the weight of the fronds to keep the nest in position.

The gully visited is a typical "fern gully," the tree ferns hugging the rivulet, which is almost a cascade, the sides of the gully clothed with dense bushes and larger timber.

I saw no sign of the *Acanthornis*, although I waited quietly in the locality for several hours, incidentally, wet to the skin, as there had been a heavy shower, and the ferns and bushes were dripping. My idea is that the birds only visit these tree fern gullies in the upper range during the breeding season, and that during the rest of the year they must be searched for in the dense bushes that clothe the gullies lower down. The old locality near Newtown in Kangaroo Valley was essentially a bush gully, unfortunately from the ornithologist's point of view, now mostly occupied with gardens, and the *Acanthornis* naturally has disappeared from that habitat.

On the 9th October we unexpectedly met with this bird at an altitude of about 1,500 ft. in a gully known as "The Sidling" near Scottsdale, in North-Eastern Tasmania. The sides of the gully were very precipitous, but covered with dense scrub, below the road a number of bushes had been cut down by some men who were erecting a telegraph line, and it was amongst these fallen bushes that the *Acanthornis* was first noted, its movements and general appearance were very similar to *Sericornis* (*frontalis*) *longirostris* (Q and G), afterwards several were seen in the bushes on the other side of the road. They were searching for insects as much in the bushes as the ground. Not once did we detect a call note, but I was fortunate to hear one trilling out a very sweet little song, reminding one of the song of a *Sericornis*, but yet dissimilar.

Later, on 13/10/16, I again met with this bird in "Wenney's Gully" on the River "Don", near the Latrobe, in North West Tasmania.

This gully cannot in any sense be described as a Tree Fern gully, but was clothed with bushes, myrtle, and big timber. The gorge was very precipitous. *Acanthornis* were work-

ing for insects both amongst the fallen debris, and amongst the branches of the bushes, also up the trunks of the trees with a very similar action to a tree creeper's, but not once did I hear them make any call note or song.

I think probably it is a new locality for this bird, but Mr. Butler records it from considerably further to the West. Mr. F. M. Littler in his birds of Tasmania, calls it the "White Breasted Scrub Tit," certainly a very descriptive name.

Locally it was known to my friends at Latrobe, when as boys they had been egg collecting, as the "little scrub bird" in distinction to the "*Sericornis humilis*", which they knew as the "Greater scrub bird." Its habits, movements, and general appearance lead me to conclude that it is more closely related to the genus *Sericornis* than to that of *Acanthiza*, where Gould originally placed it.

The rarity of this bird is probably due to its retiring habits, and general lack of call notes. It is evidently widely distributed though very local in its haunts.

EDWIN ASHBY,

"Wittunga", Blackwood.

Birds of the

• North and North-West of Australia.

From Notes and Skins made by the late Capt. T. H.
Bowyer-Bower.

By GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U.,

No. 9.

No. 97. ANHINGA NOVAEHOLLANDIAE. Darter.

Plotus novaehollandiae (Gould). Proc. Zool. Soc. (Lond.), 1847, p. 34. New South Wales.

No. 535—♀. Length, 36.5 inches (10/11/86).

On being wounded its mate remained with her and they dived about, often going some two hundred yards under water. When they came to the surface they only showed

their snake-like head, and at most three inches of their long neck. They dived before the gun could be put to the shoulder. When diving they do not make a splash, but simply, though quickly, sink.

101. CATOPTROPELICANUS CONSPICILLATUS WESTRALIS. Western Pelican.

Pelecanus conspicillatus westralis (Mathews). Nov. Zool., Vol. XVIII., p. 244, 1912. Perth, West Australia.

No. 426—Length $67\frac{3}{4}$ inches (22/10/86).

Weight 17 pounds. Expanse of wing 8 feet 5.5 inches. Irides dark brown, eyelids lead colour, skin surrounding the eye yellowish white with a shade of blue anteriorly where it joins the feathers of the lores; bill white tinged with flesh colour on the culmen, and the base of the lower mandible; also shaded with light lead blue towards the point of the bill, particularly on the lower mandible, all the bill covered with fine blue lines, but defined at the base of the lower mandible and thickest at the base of the upper, where they give a bluish tint; hook and cutting edges of both mandibles for apical half, yellow; gular pouch white showing purplish lines, and tinged with light ochre anteriorly and shaded with pale flesh posteriorly, particularly where it joins the base of the lower mandible; tibia and tarsi white with a faint tinge and with a yellowish tint at the back of the latter; toes and webs bluish white tinged or stained with ochre; soles of feet yellowish; nails apparently nearly white, but stained with ochre.

A large quantity of fish were found in them varying from one to five inches long.

102. CIRCUS ASSIMILIS ROGERSI. Lesser Spotted Harrier.

Circus assimilis rogersi (Mathews). Nov. Zool., Vol. XVIII., p. 244, 1912. Fitzroy River, North-West Australia.

No. 277—♂. Length, 20 inches (18/7/86).

No. 392—♂. Length, 20.8 inches (9/8/86).

Irides yellow, eyelid yellow, finely margined next the eye with brown; bill black becoming bluish horn colour on the sides at the base; legs and feet pale yellow, the latter the brighter.

102. *CIRCUS APPROXIMANS INEXPECTATUS.* Little Allied Harrier.

Circus approximans inexpectatus (Mathews). Nov. Zool., Vol. XVIII., p. 245, 1912. Perry's Creek, North-West Australia.

No. 154—♂. Length, 21 inches (19/6/86).

Irides pale yellow; bill black, bluish horn colour at the base; legs dull yellow. This bird works over the flats like a dog.

104. *UROSPIZA FASCIATUS DIDIMA.* Northern Goshawk.

Astur fasciatus didimus (Mathews). Austral. Av. Rec., Vol. I., p. 33, 1912. Melville Island.

No. 143—♂. Length, 17.2 inches (17/6/06).

No. 211—♀. Length, 18 inches (30/6/06).

Irides fine yellow, eyelash black, with an outer rim of yellow; bill black, bluish horn at the sides of the upper mandible at the base, and lead colour at the base of the lower, cere and gape dull yellow tinged with green; tarsi greenish yellow, toes dull orange yellow.

No. 245—♂. Length, 14.5 inches (31/8/86).

Irides splendid yellow, eyelash pale ochre with a fine brown line next the eye; bill black at the tip, becoming lead blue on the sides, at the base, cere dirty yellow; legs and feet orange yellow.

No. 438—♀. Length, 16.7 inches (25/10/86).

Irides beautiful bright yellow, eyelid yellow, with a fine black line inside; bill black becoming bluish horn at the base, cere and gape greenish yellow; legs and feet ochre.

104. *ACCIPITER CIRROCEPHALUS BROOMEI.* Western Collared Sparrow Hawk.

Astur cirrocephalus broomei (Mathews). Nov. Zool., Vol. XVIII., p. 247, 1912. Broom Hill, South-West Australia.

No. 39—♂. Length, 17 inches (24/5/86).

Irides light yellow; bill black, base bluish lead, cere greenish yellow; legs dull yellow.

No. 67—♂. Length, 16 inches (30/5/86).

Irides light yellow, eyelids yellow, bill black, cere greenish yellow; feet dull yellow.

No. 413—♂. Length, 11.7 inches (19/10/86).

No. 475—♂. Length, 12 inches (29/10/86).

Irides fine yellow, becoming orange on the outer circle, eyelid dull yellow, with a fine black line next the eye; bill with culmen and apical half of mandible black, remainder bluish horn, cere and gape dirty yellowish green; tarsi dull yellow tinged with brown on the sides, feet orange.

105. *UROÆTUS AUDAX CARTERI*. Western Wedge-tailed Eagle.

Aquila audax carteri (Mathews). Nov. Zool., Vol. XVIII., p. 247, 1912. West Australia.

No. 307—♂. Length 3 feet (24/7/86).

Wing from tip to tip 6 feet $7\frac{1}{2}$ inches, weight eight and a half pounds. Irides grey, becoming brown round the pupil; bill, upper mandible black at the tip, becoming bluish horn, then passing into yellowish white at the base, lower mandible bluish horn at tip white for the remainder, but tinged with blue at the base, cere dirty yellow, skin on the lores bluish flesh colour; feet white.

107. *HALIASTER INDUS LEUCOSTERNUS*. White-headed Sea Eagle.

Haliastur leucosternus (Gould). Synops. Birds of Austr. Pt. III., pl. 40, 1838. New South Wales.

No. 336—♀. Length, 18.5 inches (17/9/86).

Irides brown; bill bluish horn becoming whitish towards the tip, cere lead colour; legs and feet yellowish white; claws black.

No. 453—♂. Length, 18 inches (27/10/86).

Irides brown; bill whitish horn tinged with yellow and passing into leaden blue at the base and gape, cere light leaden brown; legs and feet pale yellowish white.

108. *HALIASTUR SPHENURUS.* Whistling Eagle.

Milvus sphenurus riellot, Nou. Dict. d'Hist. Nat. Vol. XX., p. 564, 1818. New South Wales.

No. 152—♀. Length, 22.1 inches (19/6/86).

Irides brown; bill and cere horn colour; legs and feet bluish white.

No. 172—♂. Length, 20.6 inches (26/8/86).

Irides dark brown, skin on lores and around the eye bluish-white showing through the thin covering on these parts; legs and feet white.

No. 280—♀. Length, 23 inches (18/7/86).

No. 287—♂. Length, 21.5 inches (19/7/86).

Irides light greenish-brown, eyelids brown, skin on lores slaty-brown; bill and cere brown, becoming lighter on the cutting edge of the upper and lower mandibles; legs and feet white.

108. *MILVUS KORSCHUN AFFINIS.* Allied Kite.

Milvus affinis (Gould). Synops. Birds Austr., pt. III., pl. 47, 1838. New South Wales.

No. 37—♀ (22/5/86).

Irides dark brown; bill black, cere and feet yellow.

109. *GYPOICTINIA MELANOSTERNA DECEPTA.* Northern Buzzard.

Gypoictinia melanosterna decepta (Mathews). Nov. Zool., Vol. XVIII., p. 250, 1912. Parry's Creek, North-West Australia.

No. 381—♀. Length, 22 inches (9/10/86).

111. *FALCO HYPOLEUCUS.* Grey Falcon.

Falco hypoleucos (Gould). Proc. Zool. Soc. (Lond.), 1840, p. 162, 1841. West Australia.

No. 269—♀. Length, 15.6 inches (17/7/86).

Irides brown, eyelid brown; orbital space white tinged with yellow anteriorly, and at the posterior corner of the eyelid; bill, upper mandible, extreme tip as far as the notch

bluish black, passing into light bluish lead colour along the culmen, but not extending to the cere, the notch and a stripe therefrom following the curve of the culmen, lead colour gradually fading into the yellow of the bill, which colour is brightest at the base, becoming of a whitish tint on the cutting edge and on the stripe between the lead colour of the culmen, and the streak from the notch; lower mandible bluish horn at the tip, passing into greenish white and finally into white at the base, cere and gape deep but not bright yellow, the former lighter and almost white anteriorly; legs and feet orange; claws black.

This bird's flight is very swift, and all birds, large and small, seem much afraid of it.

111. *RYNCHODON PERIGRINUS SUBMELANOGENYS.* Western Black-cheeked Falcon.

Falco perigrinus submelanogenys (Mathews). Austral. Av. Rec., Vol. I., p. 33, 1912. South-West Australia.

No. 536—♀. Length, 17.6 inches (10/11/86).

Irides dark brown, cere and orbital space fine yellow. A narrow ring of brown round the eyelid, bill bluish lead, becoming black at the tip of the upper mandible and shading into yellowish horn at the base of both mandibles; legs and feet bright yellow.

111. *FALCO LONGIPENNIS ASPLEYI.* Northern Little Falcon.

Falco lunulatus aspleyi (Mathews). Austral. Av. Rec., Vol. I., p. 33, 1912. Melville Island, Northern Territory.

No. 181—♂. Length, 12 inches (25/6/86).

Irides dark brown, orbital space bluish-white; bill bluish, darker at the tip, cere bluish yellow on the culmen; legs yellow.

No. 250—♀. Length, 13.1 inches (14/7/86).

Irides fine brown, eyelash brown, orbital space bluish-white, the same at the base of the bill; bill bluish-black at the tip, passing into bluish-white at the base, cere pale bluish-white, tinged with greenish-yellow at the top; legs and feet greenish-yellow.

No. 293—♂. Length, 11.9 inches (20/7/86).

No. 347—♀. Length, 13.7 (31/7/86).

This is often seen long after sunset.

Notes on Hatching of Cuckoo and Wren.

By J. W. Mellor.

During last year some interesting evidence came under notice relative to the nidification of the Narrow-billed Bronze Cuckoo (*chrysoccyx basalis mellori*) an egg of which was discovered in a nest of the Southern Blue Wren (*Malurus cyaneus leggei*) at Fulham, S.A., on August 30, there being three eggs of the latter bird also in the nest. The eggs were left undisturbed to find out the rotation of hatching, which started next morning, August 31, by the appearance of the young cuckoo, its size being surprisingly large compared with the egg from which it had just emerged, which was exactly the size of those of the wren, and hardly any difference in colouration. The young cuckoo measured in inches in its somewhat crunched up position 1.14 inches from bill to tail, by .54 across the body, the wings being still folded up, and showing an abnormal spike at the spurious wing, while the claws were curved and exceedingly sharp, resembling those of a young hawk. The cuckoo was removed and preserved, and a close watch kept for the appearance of the young wrens, the first of which did not come out until early on the morning of September 2, followed quickly by a second chick the same morning, the third egg being chipped and hatched out during the afternoon of the same day, but the young wrens were but half the size of the cuckoo when born. Thus it can easily be seen how the young cuckoo "rules the roost," being at least two days in advance of the first wren hatched out, and at birth assuming double proportions to the young of its foster parents, the young wrens are soon edged out, or trampled to death as the vigorous young cuckoo clamours for food, which the comparatively small foster parents are barely able to supply to the extent of its needs. On September 13 the three young wrens left the nest, and perched on the twigs near by, while the parent birds fed them. It is exceedingly strange why Nature should have ordained things, so that the young of the useful little blue wren, and kindred birds should be destroyed by the small cuckoos, but it is evident from observations that such is the case, the cuckoos being given abnormal opportunities to predominate and overcome.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

By His Son, S. A. White, M.B.O.U.

XI. THE ORNITHOLOGIST AND SAILOR

Soon after sunrise on Monday, June 14th, 1880, Samuel White landed three guns and a party of the crew went on shore to cut wood. The collectors went through the thick mangroves, and explored amongst the large rookeries of both birds and beasts. Some beautiful specimens were taken of the Black-billed spoonbill (*Spatherodia regia*). Cockerell collected several other birds, and Andrews confined his researches to the vicinity of the boat where he secured a *ptilotis* or two. A fine clutch of white-headed Sea-Eagle's eggs were taken. At 11.30 all went on board with the last boat-load of wood, and made sail at noon. The wind kept very light and it was sunset before another of the Cleremont group was reached, and the anchor was let go in nine fathoms over hard sand and mud. Samuel White with one collector landed at once. A large flight of the beautiful white-shafted Ternlet (*Sternula albifrons placens*) was seen on the sandy spit, and some specimens secured. Darkness set in quickly and the boat put off to the yacht. Next morning before sunrise the vessel was under weigh, with a light but steady wind. About 10 a.m. the second lightship was passed (one having been passed the day before) and soon afterwards a large steamer bound South. All the birds procured at the last stopping place were skinned and cured, and just before sunset the yacht brought up under Cape Yarmouth in four fathoms over sand. Samuel White landed and went into the scrub, but did not procure anything. Next morning just as the anchor was off the bottom line, native canoes came off. They had a little Tortoise shell to dispose of, and a variety of small things were bartered for seven thin pieces. The canoe was different to those found further South, it was a "dug-out" about 18 feet long, and about 18 in. wide, with outriggers on either side. Those seen further South were made of bark about a quarter of an inch thick, very tough and sewn together with fine rattan, and strengthened with small saplings, which were sharp at both ends and about 10 or 12 feet long, by about two feet six inches wide, with about two feet depth, and propelled by short, broad paddles. In a note my father says, "About ten o'clock to-day we passed a low sandy island to leeward, when we saw the schooner 'Royer' lying at

anchor, and I made out one of my old friends and acquaintances, one of the Torres Straits pirates, Captain Hovel." By noon the yacht passed Cape Glanville, then a course was steered for Hanabal Island. At 3 p.m. "Bird" Island was passed, and at 5 p.m. we made for Hanabal Island, bringing up in 7 fathoms. A boat was lowered and Samuel White with one collector landed, and found that the island was very small and scrubby, nothing of note being found, and only a few sea-birds were taken. On 16th at daylight the yacht was on her way, after passing Charring Cross Island. A top-sail schooner was sighted beating South, and then the S. S. Cored going in the same direction. At 3.30 p.m. anchor was dropped in Albany Passage. Notes made by my father on the day read:—

"We dropped anchor opposite the home of my old friend Jardine, and close to his yacht, and went on shore to see him, and received a warm welcome." The weather was very fine, but inclined to be hazy in the morning. The crew were very busy all day on the 17th getting water on board. Samuel White busied himself getting butterfly nets fixed up, and putting collecting gear in order. The weather was fine, but the swell made the craft roll.

The 18th was a very busy day with all on board. Some of the crew left the yacht at an early hour to cut firewood on shore, another section took the big boat on shore, and beached it for repairs, it having been damaged during rough weather. Samuel White in his notes under the above date says. "The men washed up all their clothes to-day. Cockerell made some tan from Mangrove bark, and tanned all his clothes, shirts, hats and everything else. He also tanned some things for me, which makes them more desirable and less conspicuous when collecting, the fishing net was treated in the same way. I was up with Mr. Jardine and had a long chat with him. It is always a pleasure to me to engage in a conversation with that gentleman, for I look upon him as being a man of good sense, and much practical experience. The weather is squally, with light showers of rain, just the weather I experienced here the year before last." The next day while the crew cleared up the ship Samuel White with one of his taxidermists cleared and straightened up the specimen room, packing up some of the bird skins, and in his notes he says. "I packed a number of bird skins such as Ospreys, Cranes, Egrets, etc., into seven boxes and sent some

of the men on shore with these to Mr. Jardine's house to remain there till my return. My old friend came off to my boat with me and we spent a pleasant evening together." Early Sunday morning, the 20th, some of the crew went on shore and brought off the big boat, and letters were left for the next mail going South. The anchor was heaved and with a light breeze the yacht stood on her way. The wind kept light all day, and little progress was made. We passed through Endeavour Straits, and reached Booby Island an hour before sunset, and the anchor was dropped in 4 fathoms over coral. A boat was lowered at once and Samuel White landed, and in his notes he says:—

"Booby Island is too small to afford much shelter. It is a granite rock which rises out of the sea almost perpendicularly, indeed it is nothing more than a big rock, it is not more than a quarter of an eighty acre section composed of red and white volcano stone, with a few bushes growing in some of the crevices. It was difficult to ascend and is entirely bare of earth; the look of the place is inhospitable, barren and cheerless as can well be imagined, and I was much surprised to find a number of baldcoots (*Porhyrio*) on the top. These birds are usually found on sodgy banks of fresh water rivers, reed-beds, or swamps, but here they were running about on a bare rock without any appearance of fresh water, but upon walking over the island I discovered several more holes in the rock near the top of the island, which were filled to the brim with beautifully fresh and cool water. I believe the holes were permanent, as they were of considerable depth, like wells in the rock. This is where the above mentioned birds watered."



Booby Island is celebrated as having being at one time a refuge or depot for ship-wrecked mariners. In a cave on the north side the Government stored quantities of provisions and medicines for the ship-wrecked. Letters were also left there by passing ships in those days, to be conveyed south by war-ships, which called regularly for the purpose. In this cave there are still remains of stores, heaps of cask hoops and staves, tin cans which fell to pieces as soon as touched, the names of many callers are marked upon the walls of the cave. This depot is rendered unnecessary now owing to the settlement on Thursday Island, which is one of the Prince of Wales group. During the night the yacht touched the bottom several times, at first very lightly, but later the tide having risen considerably swung the schooner on to a lump of

coral. As soon as the anchor was heaved upon she cleared and was soon under way. The wind was very light up to 2 o'clock, when it freshened, and a good run was made.

The following night was beautifully clear and wind fresh, so that up to noon the next day the little vessel made 180 miles. A good big sea was met with which was not expected in this shallow region. This part of the voyage seemed very monotonous after the beautiful and varied scenery of the Barrier Passage. This was the second day without seeing land. The weather became cloudy more or less both night and day. During the night of the 22nd the water shallowed suddenly and upon sounding it was found that the water was only 4 fathoms and even by the dim night-light looked white and muddy. The captain altered the course from N.W. to S.W. and the water soon deepened. It was surmised that the vessel was close to Frederic Henry's Island, but although the night was not dark and the moon shone out at times, no trace of land could be seen. All day a good breeze was blowing, and a good headway was made, and the Aru Islands were expected to be in sight the next day. As soon as the yacht left Booby Island she was attended by numerous birds, Terns, Gulls, Noddies, and Gannets, two of the latter following the vessel for a long time, making attempts to alight on deck or spars. In his notes my father says:—

“Just after sunset the man at the wheel struck one of the gannets which was attempting to alight upon his head. I was standing close up, the bird rolled over and made off uttering a loud hoarse croaking noise, and we saw him no more. His mate sailed round a few times and rested on the weather end of the square sail yard, and as there was another sail set above it the bird was safe, as a man could not reach the end of the yard while the sail was set. All the efforts of some of the crew who exerted themselves failed to drive the bird off. They shook the braces, and pelted him with coal and although several pieces struck him, he refused to quit the yard. While bracing the yard the bird was knocked off by the flapping of the sail, but he managed to regain his place, and when I went below, was sitting with his head under his wing. When I returned to the deck in the midnight watch, he was comfortably perched on the main crosstrees, while the ship was rolling and sails flapping. At 6 a.m. I found the bird with his legs tied. One of the crew had gone aloft and captured him while asleep. I gave him his liberty, and in way of showing his gratitude he bit my fingers severely.”





W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.



J. H. Riley

Vol. III.

Part 2.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st APRIL, 1917.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Price, 2/-



THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd.,
Grenfell Street, Adelaide.

CONTENTS.

	PAGE
South Australian Ornithological Association	29
Order Passeriformes, Family Laniidae, Genus <i>Falcunculus frontalis flaviculus</i>	30
Birds of the North and North-West of Australia No. 10). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	34
Further Notes upon the Arctic Skua (<i>Stercorarius parasiticus</i>). Capt. S. A. White, M.B.O.U.	38
New Record for South Australian Waters—Finding the Flesh-footed Petrel (<i>Puffinus carneipes</i> , Gould). Capt. S. A. White, M.B.O.U.	39
Notes on <i>Ashbyia lovensis</i> . J. R. B. Love	40
Notes on <i>Amytornis merrotsii</i> . J. R. B. Love	42
Note on Incubation Period of <i>Leucopoliis ruficapillus</i> (the Red-capped Dotterel). F. E. Storr	42
Birds Breeding at "Glenburne." J. W. Mellor	43
Note on the Stone Plover (<i>Burhinus magnirostris</i>). F. R. Zietz	44
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	44

— THE —

South Australian Ornithologist.

VOL. III.]

1ST APRIL, 1917.

[PART 2.

The South Australian Ornithological Association.

Owing to the majority of members being out of the city for the holidays no December Meeting was held,

January 26th, 1917.

A monthly meeting was held. Dr. A. M. Morgan presided. The Hon. Secretary stated that the matter of introduced Sparrows (*Passer domesticus*) travelling along the East-West Railway into Western Australia should be finally dealt with. A long discussion took place. Some of the leading Ornithologists expressed their belief that the sparrows would not follow the line, and others said it would only be the matter of time when they would reach the Western State. The majority of the members present recommended that the authorities should be advised to instruct all station masters to destroy sparrows at sight. Capt. S. A. White opposed this on the grounds that pipits, which he had found to be very numerous along the East-West Railway lately, would fall victims to this order, and that more harm than good would be done by destroying useful insectivorous birds. A specimen of the Greenfinch (*Chloris chloris*) was shown by Capt. White, who stated that this imported bird had been sent to him for identification by Mr. L. G. Folland, who stated that the bird was doing damage among the gardens in the hills. The opinion was expressed that the Greenfinch would soon rank next to the Starling as an imported pest. It was a much more wary bird than the Sparrow, and possessed a larger and stronger bill. Mr. F. R. Zietz stated that the first of these birds to get their

liberty in South Australia, escaped, owing to a fire taking place next door to a bird fancier's shop in Adelaide. A window was broken, and the cages containing the birds fell out and opened. Since then he had seen these birds nesting in the pines in the Botanic Park. Some late nesting of native birds this year was recorded. The remainder of the evening was given up to Mr. Ashby, who spoke upon "Some Tasmanian Birds and Eggs." This speaker mentioned the eggs of the Spotless Crake (*Porzana plumbea immaculata*) describing how artfully the nest is placed amid the grass and rushes, growing in the swamps, the eggs of the Tasmanian Spotted Ground Bird (*Cinclosoma punctatum dovei*) were also shown, with a clutch of the South Australian form (*C.p. neglectum*) for comparison, the latter having very unusual markings. Skins of *Acanthornis magnus* were shown, and it was explained that they were taken from a district hitherto unassociated with this bird. Other birds exhibited were the Tasmanian Tit (*Acanthiza ewingii*) the Brown Rumped Tit (*A. pusilla diemenensis*), the Streaked Field Wren (*Calamanthus fuliginosus*), the Tasmanian White-bearded Honey Eater (*Meliornis noronchollandiae canescens*) Mr. Ashby stated that he found the latter bird very plentiful amidst the low bush in the great Lake district. The speaker showed a fine specimen of the Swift Parrot (*Lathamus discolor tregellasi*) and stated that strange as it may seem these birds were numerous among the trees in the city of Hobart at the time of his visit, but not one example did he see in the surrounding country. At this stage the remaining material was held over for next meeting.

February 23rd., 1917.

A monthly meeting was held, Dr. A. M. Morgan presided. The Chairman welcomed the Chief Inspector of Fisheries and Game (Mr. Bruce), and said he hoped that gentleman would be a constant visitor to the meetings. A discussion again took place in reference to the sparrows following the East-West Railway into Western Australia, but upon a member stating that he was in communication with the executive of the Council for Science and Industry, as to making use of his services in the matter, the Chairman and others said that would settle the question, for nothing better could be done.

Mr. J. W. Mellor gave some interesting notes upon late nesting of native birds upon his property in the Mount Lofty Ranges, and pointed out what a number of birds had taken ad-

vantage of artificial nesting places which he had placed about his property for them.

Captain White showed some specimens of Arctic Skuas (*Stercorarius parasiticus*), and stated that the stomach contents of these birds largely consisted of grasshoppers or plague locust (*Chortoicetes terminifera*), and the beaks of *Cephalopods* (Cuttlefish, Octopus, etc.), he also exhibited a specimen of the Flesh-footed Petrel (*Hemipuffinus carneipes*) stating that this was a record for South Australian waters. John Gould having described this bird from Western Australia in 1844. Capt. White also explained that these birds were secured through the kindness of the Messrs. Rymill. Mr. F. E. Parsons exhibited a specimen of the Stubble Quail (*Coturnix pectoralis*), Southern Crested Honey-eater (*Phylidonyris pyrrhoptera indistincta*), and the Grass Parrot (*Neonanodes elegans*). Mr. Ashby then continued his description of Tasmanian birds from last meeting. He exhibited a number of specimens of many species, and gave an interesting account of the conditions under which they were taken. The Grass Parrots *Neonanodes* inhabiting Tasmania were discussed, and the speaker pointed out the great rarity of some of these species, where they were once very numerous. He also drew attention to the strange call of the black Crow Shrike (*Strepera fuliginosa*).

Some honey-eaters were shown, and among them the Strong-billed Honey-eater (*Melithreptus validirostris*), the Black-headed Honey-eater (*M. affinis*, Gould's *melanocephalus*), and the beautiful Yellow-throated Honey-eater (*Nesoptilotis flavicollis flavigula*), and attention was drawn to its wonderful series of pleasing notes. Mr. Ashby explained how all the birds varied with the great range of altitude.

Mr. F. R. Zietz (Museum Ornithologist) exhibited a number of birds from the Museum collection for comparison.

Order Passeriformes, Family Laniidae, Genus *Falcunculus*.

Falcunculus frontatis flaviculus—Frontal Shrike-tit.

Description.—Upper surface—Forehead, crown of head, and back of neck, black; lores, white, bounded behind by a narrow black patch, extending from the back of the head. This is succeeded by a broad white patch extending backwards on

either side of the head to the hind neck. Back, olive green, somewhat brighter on the upper tail coverts. The feathers of the top of the head lengthened into an erectile crest.

Under surface.—Chin, throat, and upper breast, black, bounded on either side of the neck by a broad patch of white; rest of the under surface bright yellow.

Wing.—Primaries, secondaries, and wing coverts, dull black; all, except the first primary, narrowly edged with light grey. The outer webs of the secondaries washed with olive green.

Tail.—Two central feathers dark grey, the two outer feathers with the outer webs white, and the inner grey largely tipped with white, the rest with inner webs dull black, outer webs grey.

Legs and feet, dark brown; bill, black; iris, reddish brown.

Measurements.—Total length of skin, 165 m.m.; Wing, 82 m.m.; Bill, 16 m.m.

The female differs from the male in being slightly less in all measurements, in having the chin grey, and the throat and upper breast olive green, instead of black, and in having the bill dark brown colour, with lighter edges. The young resemble their parents from the nest.

Distribution.—All parts of South Australia in which Eucalypti are found, except Kangaroo Island and Eyre's Peninsula. It has been recorded from as far north as Moolooloo in the Flinders Ranges, and as far south as Penola. Nearly allied sub-species inhabit the whole of the eastern and northern parts of the Continent, Western Australia having a species of its own. No species occurs in Tasmania.

Habits.—This handsome bird is still commonly, though sparsely distributed throughout the Adelaide parks and gardens, though from its retiring habits it is not often recognised, but anyone familiar with its mournful whistle can find a pair in almost any part of the park lands. They are common in the hills about Blackwood and Belair, but less so in the higher more thickly timbered parts of the Ranges. They are very local birds and a pair once located can be found about the same situation year after year, and all the year round.

In the Autumn and winter each pair is generally accompanied by last season's brood, the latter being driven away at the approach of the next nesting season. They usually keep

to the middle and lower parts of the trees where loose pieces of bark may be found, underneath which they find their food. They can detach surprisingly large pieces of bark, and when at work on the trunk of a gum tree, a pair of these birds will make a considerable noise, when pulling off and dropping the pieces of bark for they move from one piece to another with great rapidity. If a piece of bark be hard to move, they give it a shake with the bill, and then listen for insect movement underneath it before pulling it off. They are pugnacious birds at nesting time, when they will drive any intruders out of their particular district.

Flight.—Rather slow and undulating, and never long continued.

Song.—A long drawn mournful whistle is the commonest, another note is a double whistle, the second being drawn out; and a third note is a triple sound, something between a whistle and a chatter, resembling the words chet-a-chet frequently repeated. The song is uttered all the year round, but is louder and more frequent in the breeding season.

Food.—Chiefly insects taken from beneath the bark of trees. They have been known occasionally to break open and eat soft shell almonds.

Nest.—The nest is one of the most difficult to find of all Australian birds, and when found is often inaccessible. The site most commonly chosen is an upright fork at the extreme top of an Eucalyptus sapling, at a height varying from 20 to 30 feet from the ground. The birds first nip off the small twigs about 5 or 6 inches above the selected site, and then score the bark of the inner surfaces of the twigs to which the nest is to be attached, right down to the wood; the edges of the wound in the bark soon curl outwards, and so afford a firmer hold for the nesting material. The nest is pear shaped, and is built of fine strips of bark bound together with cobweb, and outwardly decorated with the teased up silk of spiders' cocoons; it is lined with fine dried grasses. The upper edge of the nest is curved inwards to prevent the eggs being thrown out in a high wind, the nest has to be turned almost upside down before the eggs will roll out. Both sexes assist in building the nest. If the nest be taken, another is built within a fortnight, within a 100 yards of the first, but it is not certain whether two broods are reared in the season under normal conditions. Three eggs are almost invariably laid, very occasionally four.

Eggs.—Ground colour, white, sparingly marked with small roundish spots of black, dark brown and purplish grey, the latter being semi-submerged. The spots are more numerous at the larger end. A clutch of three eggs measured 1. 2.40 c.m. x 1.70 c.m. 2. 2.50 c.m. x 1.70 c.m. 3. 2.50 c.m. x 1.70 c.m.:

Birds of the North and North-West of Australia.

From Notes and Skins made by the late Capt. T. H.
Bowyer-Bower.

[BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., ETC.,]

No. 10.

111. *FALCO LONGIPENNIS* APSLEYL.—

This is often seen long after sunset flying about hawking at a good safe height apparently catching insects with its feet, and eating them while on the wing, this operation continues till it is too dark to observe the bird. One bird on being opened also had the leg of a small parrot in its stomach.

112. *IERACIDEA BERIGORA MELVILLENSIS*. Northern Brown Hawk. *Ieracidea berigora melvillensis*—Mathews, Austral. Av. Rec. Vol. 1, p. 34, 1912. Melville Island, Northern Territory.

35. ♀ Length $18\frac{3}{4}$ 21/5/86—Irides brown; bill bluish, tip black; legs dull greenish-white.

36. ♂ Length $16\frac{1}{4}$ 21/5/86.

70. ♀ Length 18.5 31/5/86—Irides light brown, gradually shaded off to white on the outer circle, orbits bluish white, tinged with yellow at the corner of the eyes; bill bluish, black at tips; cere yellowish white; feet greenish white.

92. ♀ Length 18.5 4/6/86—Irides dark brown, bill light blue black at the tips, cere bluish flesh colour; legs and feet greyish white.

175. ♂ Length 16.5 24/6/86—Irides dark brown, eyelash and orbital space bluish white, distinctly tinged with light yellow on the eyelash, and at the corners of the eyes; feet bluish white.

176. ♂ Length 16.3 24/6/86—Irides brown, eyelash and orbital space bluish-white, very slightly washed with yellow on the eyelash and at the interior corner; bill bluish horn shading into dark brown at the tip, cere bluish white; legs and feet bluish white.

222. Length 17.3 3/7/86.

240. ♀ Length 18.9 13/7/86.

240A. ♂ Length 17.1 30/8/86—Shot from a nest which contained two eggs and a young in down.

315. ♂ Length 16.7.

113. CERCHNEIS CENCHROIDES MILLIGANI. Dusky Nankeen Kestrel. *Cerchneis cenchroides milligani*—Mathews, Nov. Zool. Vol. XVIII., p. 253, 1912, Parry's Creek, North-west Australia.

158. ♂ Length 12.5 20/6/86—Irides dark brown; orbital space yellow; bill bluish, base and cere yellow; legs deep yellow.

305. ♂ Length 12.5 22/7/86—Irides brown, orbital space yellowish white, brightest in front of the eye; bill bluish black at the tip, becoming bluish horn on the culmen and edge of the upper mandible, in front of the nostril yellowish; lower mandible bluish horn at the tip, becoming yellow at the base; legs and feet ochre.

113. PANDION HALIAETUS CRISTATUS. White headed Orprey.

Buteo cristatus Vieillot Nouv. Diet. d'Hist. Nat. Vol. IV., p. 481, 1816, Tasmania.

427. ♀ 23/10/86—Irides yellow, eyelid dark brown, orbital space with the skin of a leaden hue, bill black, cere, gape, and basal portions of the lower mandible lead colour; feet and legs white, terminal scales of toes with a brown mark, claws black.

When shot this bird had a garfish in the claws which was still in position when brought in, the reverse of the outer toe being well shown, the fish being held from four nearly opposite points.

114. SPILOGLAUX BOOBOOK MIXTA. Pallid Boobook Owl. *Vinox boobook mixta*.—Mathews, Nov. Zool. Vol. XVIII., p. 255, 1912, Parry's Creek North-west Australia.

324. ♂ Length 11.5 28/7/86—Bill, upper mandible dark brownish horn passing into bluish horn on the basal half of the culmen, lower mandible bluish brown at the tip, becoming bluish horn at the base, cere bluish slate.

115. *HIERACOGLAUX CONNIVENS OCCIDENTALIS*. Western Winking Owl. *Ninox connivens occidentalis* Ramsay, Proc. Linn. Soc. N.S.W. Ser. II. Vol. 1., 1886, 1887, Derby, North-west Australia.

409. ♂ Length 15.7 17/10/86—Irides orange yellow, eyelid olive yellow; bill dull yellow, bluish lead at the tip, feet dull yellow, soles orange, claws black, base bluish.

437. ♀ Length 15.2, 25/10/86.

116. *TYTO ALBA DELICATULA*. Masked Owl. *Strix delicatula* Gould, Proc. Zool. Soc. (Lond.) 1836, p. 140, 1837, New South Wales.

252. ♀ Length 13.5, 15/7/86.

253. ♂ Length —, 15/7/86.

254. ♂ Length 12, 16/7/86—Irides black, eyelash purple-brown, bill, upper mandible white at the tip, shaded with brown on the culmen and sides, darker on the latter, lower mandible fleshy white, skin at the base of the bill flesh colour; legs and feet brownish-white, claws brown.

255. ♀ Length 12.3, 16/7/86.

256. ♂ Length 12.3, 16/7/86.

257. ♂ Length 12, 16/7/86.

258. ♀ Length 11.4, 16/7/86.

357. ♀ Length 13.3, 2/8/86.

393. ♀ Length 13.2, 2/8/86.

119. *TRICHOGLOSSUS RUBRITORQUIS*. Red-collared Lorikeet. *Trichoglossus rubritorquis* Vigours and Horsfield, Trans. Linn. Soc. (Lond.), Vol. XV., p. 291, 1827, North-West Australia.

Palmerston, 8/5/86.

3. ♀ Bill orange yellow; feet slaty-grey.

5. ♂ Length 12 $\frac{1}{4}$ —Bill orange-yellow; feet slaty-grey.

9. ♂ Length 12 $\frac{1}{2}$ —Bill orange-yellow; feet slaty-grey.

11. ♀ Length ——Bill orange-yellow; feet slaty-grey.

12. ♂ Length 12—Bill orange-yellow; feet slaty-grey.

13. ♀ Length 12 $\frac{1}{2}$ —Bill orange-yellow; feet slaty-grey.

45. ♂ Length 13 $\frac{1}{2}$ —Derby 26/5/06. Bill scarlet, with yellow tips; legs olive.

46. ♀ Length 13 $\frac{1}{4}$ —Derby 26/5/06. Bill scarlet, with yellow tips; legs olive.

53. ♂ Length 12 $\frac{1}{2}$, 27/5/86.

59. ♂ Length 11, 29/5/86.

- 71. ♂ Length 12.9, 31/5/86.
- 72. ♂ Length 12.5, 31/5/86.
- 73. ♂ Length 12.5, 31/5/86.
- 241. ♂ Length 12.5, 30/8/86.
- 325. ♂ Length 13.6, 28/7/86.
- 328. ♂ Length 13.6, 29/7/86.
- 384. Length 12, 7/8/86.
- 528. ♀ Length 12.6, 8/11/86.

120. PSITTEUTELES VERSICOLOR MELLORI. Northern Varied Lorikeet. *Trichoglossus versicolor mellori* Mathews, Nov. Zool. Vol. XVIII., p. 259, 1912, South Alligator River, Northern Territory.

7. ♂ Length 8. 8. ♀ Palmerston, 8/5/86—Irides white, bill orange-yellow, with black tips, cere white; feet lavender.

These birds were shot together, while feeding on the flowers of a gum tree, and were the only ones seen.

69. ♂ Length 7.9, Derby 31/5/06—Irides white; bill orange red, cere and space round the eye, white; feet grey.

140. ♂ Length 8, 16/6/86.

304. ♂ Length 8, 22/7/86—Irides hazel of three shades; round the pupil a thin but bright and light ring, next a hazel ring surrounded by one of a lighter shade, eyelid light-brown; bill red, with an orange shade, tip of upper mandible brown, cere and orbital space white; legs and feet bluish slate colour.

329. ♀ Length 7.4, 29/7/86.

374. ♀ Length 7.5, 6/8/86.

375. ♀ Length 7.5, 6/8/86.

378. ♂ Length 8.1, 6/8/86.

524. ♂ 7/11/86.

458. ♀ Length 7.3, 27/10/86—Irides brown, of three rings, the inner lightest and very sparkling and the middle, which is widest and darkest; eyelid with minute dots of brown; bill brownish yellow, with the cutting edges and tip transparent horn colour, cere and orbital space white; feet slate colour.

459. ♂ Length 7.45, 27/10/86—Similar to the above.

122. CALYPTORHYNCHUS BANKSII MACRORHYNCHUS. Great-billed Black Cockatoo. *Calyptorhynchus macrorhynchus* Gould, Proc. Zool. Soc. (Lond.) 1842, p. 138, 1843, Port Essington, Northern Territory.

141. ♀ 16/6/86.

200. ♂ Length 24.2, 27/6/86.

212. ♀ Length 23, 30/6/86—Irides dark brown, eyelash and naked space about the face, black; feet nearly black.

247. ♀ Length 23, 14/7/86.

265. ♂ Length 23.3, 3/9/86.

Further Notes upon the Arctic Skua (*Stercorarius parasiticus*).

By S. A. WHITE, M.B.O.U.

It is again through the kindness of the Messrs. Rymill, that I have been able to procure further specimens of the above birds. This time four specimens were obtained, two of the dark phase, and two of the light. Some interesting notes have been made upon these specimens. It was interesting to find in the stomach contents of these birds, numbers of plague locusts (*Chortoicetas terminifera*). Of course it cannot be entertained for a moment that the skuas took these upon the land. There had been a strong S. E. wind blowing prior to the taking of the birds, which might have blown the grasshoppers out into the Gulf, the stomachs also contained great numbers of *Cephalopods*' beaks, and seeing that one had a partly digested squid in its stomach, it would lead one to suppose that the numerous hard beaks would belong to this species.

All the specimens were taken in St. Vincent Gulf, on February 13th, 1917. They were as follows.—

No. 1. ♂ White phase, total length $19\frac{1}{2}$ in., total stretch of wings $40\frac{1}{2}$ in.; wing full stretch 19 in.; feet deep shiny black; bill, brownish black; stomach contents, small bones like those of garfish, part of squid, two grasshoppers.

No. 2. ♀ Dark phase, feathers on nape, breast, and abdomen, tipped with white; weight, 1 lb. $2\frac{1}{2}$ oz.; legs and feet, deep shiny black; bill, black; total length, $19\frac{1}{2}$ inches; total stretch of wings, 45 inches; stretch of wing, $20\frac{1}{4}$ inches; stomach contents, fish flesh, and many small bones like those of garfish, 36 beaks of *Cephalopods*.

No. 3. ♂ Light phase, total length 19 inches; total stretch of wings, 42 inches; stretch of wing, $20\frac{1}{4}$ inches; feet, deep shiny black; bill brown; stomach contents, few fish scales, and grasshoppers.

No. 4. ♀ Dark phase, total stretch of wings, $43\frac{3}{4}$ inches; stretch of wing, $20\frac{1}{4}$ in.; feet, deep shiny black; bill, dull black; stomach contents, parts of small fish, 29 grasshoppers.

I handed the sterna of these four birds to Dr. A. M. Morgan, and requested him to pass his opinion as to the ages of the respective light and dark phases, for it has been put forward by some that the dark form is the mature of the light birds. Dr. Morgan has given me the following notes.—

No. 1. ♂ Light phase, nearly mature bird.

No. 2. ♀ Dark phase, fully mature bird.

No. 3. ♂ Light phase, fully mature bird.

No. 4. ♀ Dark phase, not fully mature bird..

New Record for South Australian Waters—Finding the Flesh-footed Petrel (*Puffinus carneipes*, Gould).

BY S. A. WHITE, M.B.O.U.

Through the kindness of the Messrs. Rymill, I was able to procure a specimen of the above petrel, it was taken in St. Vincent Gulf, February 13, 1917.

Mathews in his great work "The Birds of Australia," Vol. II., part 1., separates the Norfolk Island from the western, owing to its greater size, and calls it *p. c. hullianus*. My specimen seems to agree fairly well with Gould's type bird, with the exception of total length. I feel confident that this bird is one of the western form. Gould's type measurements are as follows.—Total length 15 inches; bill $1\frac{1}{2}$ inches; tail 5 inches; tarsus 2 inches; middle toe and nail $2\frac{1}{2}$ inches. My bird in the flesh measured.—Total length $18\frac{1}{8}$ inches; wing 12 inches; total stretch of same $20\frac{1}{2}$ inches; tail $5\frac{1}{2}$ inches; tarsus $2\frac{1}{8}$ in.; middle toe and nail $2\frac{3}{4}$ inches; total stretch of wings $42\frac{1}{2}$ inches.

Gould gives the general colouration of the type as chocolate-black, the bird before me is blackish-brown, becoming lighter underneath, the primaries and secondaries being much darker; bill yellowish flesh-colour, culmen and tip of mandible brown; legs, feet, and membrane yellowish flesh-colour; nails brown; weight 1 lb. 6 oz., Stomach contents—32 beaks of *Cephalopods*.

Notes on *Ashbyia lovensis*.

BY J. R. B. LOVE.

I first secured a solitary specimen of this bird at Leigh's Creek late in the year 1910. On sending the skin to Mr. E. Ashby, he at once perceived it to be a new species, in consequence of which, after some hunting, I found a small flock of about twenty of the birds inhabiting a very barren looking stony ridge near Leigh's Creek.

Two specimens were secured, one of which, when shot, ran down a rabbit burrow, dying within three feet of the entrance. This running down a rabbit burrow at first seemed to be merely a chance, but, on further acquaintance with this bird, it appears to be a distinct, though certainly very curious trait of the species.

With the three specimens before him, Mr. Ashby classed this bird with the *Ephthianurae*, naming it provisionally *Ephthianura lovensis*. Mr. A. J. North did not concur in his view that the bird is an *Ephthianura*, and named it *Ashbyia lovensis*. Their view has further been endorsed by Mr. Gregory Mathews.

While the bird may, and probably is, closely allied to *Ephthianura* morphologically, in habits it is decidedly not an *Ephthianura*, but bears a close resemblance to *Anthus Australis*. The *Ephthianurae* live in small bushes, flitting from bush to bush.

Ashbyia lovensis runs on the ground, and at the conclusion of a run, elevates and depresses the tail in the same fashion as *Anthus*. I have never seen *Ashbyia lovensis* flit from bush to bush, nor have I noticed it perched in a bush. The favourite perch is on a small stone in an area of clear ground, or upon a fence post, when it is found near a fence.

After the first three skins were secured, a small boy at Leigh's Creek caught an adult specimen of the bird, which had run down a rabbit burrow. He took it home and placed it in a cage with his canaries. The *Ashbyia lovensis* died on the following day, and the boy's mother threw away the body, which was thus lost.

This first flock soon left Leigh's Creek, and did not reappear up till the end of 1912, when I left the district.

In December, 1910, I found the bird, in twos and threes, fairly plentiful on the gibber plains between Hergott and Killalpaninna, on Cooper's Creek.

In January, 1913, while travelling overland to Darwin, my two companions and I found the bird at intervals from Lyndhurst Siding to Oodnadatta, being quite plentiful at Stewart's Creek, where several skins were obtained. Two of these have been obtained for the Adelaide Museum from Mr. E. Ashby, and a third I forward with these notes.

At Stewart's Creek I saw the bird run down a rabbit burrow on several occasions, which at first led me to wonder if the bird nested below the surface. This final point, however, was cleared up by the discovery of the nest, near Macumba, in January, 1913.

The nest was placed in a small depression in the earth, as with *Anthus*, and contained two eggs. The eggs are pyriform, midway in size between the eggs of *Ephthianura* and *Anthus*; and are white, with brown to buff spots, assuming a band near the larger end. Seen by themselves, the eggs might be mistaken for those of the Fulvous-fronted Honey-eater. These two eggs are now in the possession of Mr. A. L. Merrotsy.

We thereafter met with the bird as far North as Charlotte Waters, which was the last place at which we found it.

It has thus been found on the gibber plains of the Lake Eyre Basin to the East, South, West and North-West. The township of Leigh's Creek is on the watershed separating the Lake Eyre from the Lake Torrens basin.

The first specimens found seem to be a small flock which had strayed just to the extreme edge of the Lake Eyre basin. As *Ashbyia lorensis* was found to be numerous a few miles North of Leigh's Creek, it would seem to belong properly to the Lake Eyre basin itself.

The above notes were written and handed to the ornithologist of the S.A. Museum (Mr. F. R. Zietz), about three years ago by Mr. J. R. B. Love, who remarked that they were a few notes on *Ashbyia lorensis*.

The paper was not read at the time, but was put aside for the time being, and unfortunately has been lost sight of among other papers until a month ago, when on perusal it was found to contain descriptions of the eggs and nest, which until quite recently had not been recorded.

—Editors

Notes on *Amytornis merrotsii*.

By J. R. B. LOVE.

This bird was first discovered in July, 1912, by Mr. A. L. Merrotsy, at Yudana-mutana in the Flinders Ranges near Leigh's Creek. Skins and eggs were forwarded to Mr. J. W. Mellor, who described the bird under the name it now bears.

In January, 1913, we discovered a nest containing two eggs of *Amytornis merrotsii*, near the Douglas Creek, East of William Creek.

In the previous July the bird seemed to be regularly nesting at Yudana-mutana. Indeed that month is the usual laying month for that district. In the following December a fall of two inches of rain, followed a fortnight later by a further $\frac{1}{2}$ inch, brought about a sudden growth of green grass, and a fortnight after this second fall, birds were found laying, among the birds so found being *Amytornis merrotsii* and *Ashbyia loensis*.

The bird when flushed from one bush, flew into the heart of the next small bush, where it crouched, allowing of one's approach to, often, within a foot, when it would flit into the next bush. Frequently we almost caught these birds in our hands, but, though they would wait till the hand almost reached them, they flitted at the last moment. We saw the bird at intervals as far North as Barrow Creek, usually among the rocks and low bushes of a ridge, though at times also among the low bushes of the plains.

I forward three skins with these notes.

Note on the Incubation Period of *Leucopoliis ruficapillus* (the Red-capped Dotterel).

[By F. E. STORR.]

A nest of the red-capped dotterel was found on bare baked mud of a small dried swamp at the Grange on December 25, 1916. It then contained one egg. It was visited again on January 6, 1917, when there were two eggs. On the evening of January 27, 1917, the first chick was hatched out. This gives an incubation period of 33 days. When the nest was visited on January 27, the egg shell was at first lying beside the chick, but as we were watching it, the parent returned, took the shell in its beak, and carried and placed it upon the ground some fifteen or twenty yards away.

Birds Breeding at "Glenburne."

(BY J. W. MELLOR.)

Birds observed late with young at "Glenburne," Stirling West, February 12, 1917.

Scarlet Breasted Robin feeding two young within a few feet of wife and children as we sat at breakfast beneath the verandah, picking up crumbs, etc., thrown out to them, the parent birds enticing the young to pick them up for themselves, which one did after a considerable amount of teaching. It was interesting to note that one of the young, presumably a male, had three small patches of bright scarlet on the chest, and thus before it was able to feed itself, showing the early stage that the red appears. Both male and female feeding young.

Blue Wren feeding four young. These birds were also exceedingly tame, coming right up to the breakfast table near the trees, and picking up the tit-bits thrown out to them, also picking up insects, etc., and feeding the young birds, all of which were in their immature plumage. It was noted that both the male and female were feeding their offspring, and that they gave to the young in rotation, passing by one that had just previously had a morsel, although the little bird tried to get the crumb intended for its brother or sister.

Rufous Thickhead feeding young in the gum trees close to the house, the old bird repeatedly whistling and calling to its offspring to come on, which it did, to receive the food.

Harmonious Shrike Thrush brought its young quite close to the table where we were having meals, being not the least afraid of the children. My little son throwing out crumbs to the parent bird, who picked them up and gave them to the young bird. The old birds were calling loudly all day, answering one another continually in beautifully clear liquid notes, which resounded again and again in the bush and trees.

White-throated Tree-creeper. It is interesting to note that the white-throated tree-creeper is very tame at "Glenburne," where needless to say the birds have a sanctuary well protected, with plenty of virgin bush and trees. These birds have roosted at night for some years under the front verandah, on a slight ledge. Last year I placed a hollow piece of wood in position just beneath the iron roofing,

and the birds soon took up their abode in it, and the same season prepared their nest of shreaded bark of the stringy bark gum, lined with hair, and in due course laid three white eggs, sparsely spotted with dark reddish-brown, and started to sit, but unfortunately something disturbed them, and the hen-bird which did all the sitting, left her charge, and the eggs went cold, and became no good. The birds have not left the place, although this year they have not laid in their old nesting place.

Note on the Stone Plover (*Burhinus magnirostris*).

By F. R. ZIETZ, R.A.O.U.

The Director of the Adelaide Zoological Gardens (Mr. A. C. Minchin) has brought under my notice a strange habit of a pair of these birds, which have nested for several seasons in the local gardens. The male bird is unable to fly, but the female has her wings complete. Two eggs constitute the clutch, and two young ones are usually hatched. Mr. Minchin, as well as several members of his staff have seen the female bird, running along and carrying a young one under each wing, with the head protruding forwards. As I have not seen a previous record of this curious habit, it would be interesting to know if this is the usual habit of these birds to thus protect their young.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

By HIS SON, S. A. WHITE, M.B.O.U.

XII. THE ORNITHOLOGIST AND SAILOR.

My father was now approaching that wonderful collection of islands which are situated between the Australian and New Guinea coasts. I say wonderful islands because they are the home of the Great Bird of Paradise, the King Bird of Paradise, as well as other interesting forms. So it can be well understood with what great expectations my father was looking forward to the next few months collecting, yet in his notes of January 23rd. he fore-shadows trouble, when he writes. "Both my taxidermists are laid up with bad feet, con-

sidering the little work they have done on the few islands we touched at, coming up the coast, I am afraid they will not stand the hard work in the tropical islands we are bound for." During the morning of January 23rd, the water was very white and muddy looking although ten or twelve fathoms deep, but it gradually became clearer and by noon was of a deep dark blue. The weather had been very cloudy all day, with the wind strong from the East. During the afternoon it suddenly shifted to the North, and heavy clouds with rain came over from the New Guinea Coast. Under the above date Samuel White writes: "I came on deck at midnight, and observed an eclipse of the moon, the shadow soon passed off, and the officer on watch told me it had been a total eclipse." Next day the wind was light, and at midday the Captain discovered that he was twenty or thirty miles to the southward of the Aru Islands. Thereupon he bore up, and on a course due North, and at 4 p.m. land was seen right-ahead.

The same evening after dark the yacht brought up in 8 or 9 fathoms under the Island of Tragan. Native fires were visible on shore. Next morning (the 25th) the vessel was under weigh at sunrise, and was steered North along the coast. A sharp look out was kept for a channel mentioned by Wallace as "Kobror." After twenty-five miles had been covered, shoal waters drove the yacht out to sea for about five miles, and the channel was not seen till after it was passed. Anyway the water was too shallow to allow the boat to enter, so the course was continued for a few miles, then she was luffed in shore, and brought up in two and a half fathoms. It was a little after noon, and the vessel hardly swung round upon her anchor, when a canoe full of natives came alongside. Each one was made a present of tobacco and pipes at which they showed great pleasure. Samuel White in his notes writes: "Soon after coming to anchor a canoe full of natives came off, and after making the people some presents I ordered out a boat, and one of the crew pulled me ashore. Leaving the boat I entered a thick scrub; the ground was in a very swampy condition. I secured seven birds, four of which were new to me. Saw and heard a good many birds, but the place was so wet and swampy that it was only with great difficulty one could get about. I think rails were numerous for I heard many, and the call is like the Cape York bird." All the natives seen, were most quiet and orderly. The canoe that brought them off (there were about a dozen natives) flew the Dutch flag. They were of a light-brown colour, wearing a

piece of cloth round their waist, with the exception of the Chief, who had a dirty piece of plaid about his shoulders. They were extremely quiet, and made no attempt to come on board until they were invited, when the chief stepped over the side the rest followed. Unfortunately they knew not a word of English, nor did they understand Malay, at least they showed no sign of doing so when addressed in that language. In the evening the Chief and several others paddled out to the yacht, when they saw the owner go on board. It was amusing to watch the chief and his son, who were invited to partake of tea, they sat up to the table with knife and fork imitating all the white man's movements, and behaving in a most discreet and temperate manner. At dusk the natives were all sent on shore. They would not give or sell cocoanuts. The Chief had three half bottles of cocoanut oil, and refused three new coloured handkerchiefs for them. Samuel White again writes under January 25th: "I did not get far from the coast to-day, but the country I saw was very low and wet; there was a bank of sand along the beach covered with a dense mass of bushes, vines, and long grass, and directly beyond this a low, swampy scrub begins, and the water lay everywhere, from just below the surface, to knee deep. The scrub was dense, and I observed growing amongst it, the cane vine, cycus, casuarina, the latter grew to an enormous height and size, some of them 200 feet tall, with spurred butts that would measure more than 20 feet round. These are the largest swamp oaks I ever saw. Good numbers of cocoanut palms grew all along the coast, we observed them all day when sailing along the coast of Tragan, as well as Mycore, this must be a comparatively new feature in the Aru Islands, for when Wallace visited these Islands in 1857 there was not a single tree, the nature of the country prevented me from feeling that amount of satisfaction that I should have, upon being on a new field where every sound was new, but I distinguished many old and well known voices, among them Ralina tricolour, White Cockatoo, Blue Mountain Parrot, Oriole, Leather-head, and I shot a specimen of *Glariola grallarea*. The wind has been light all day, and it is quite calm this evening." Next day, Saturday 26th, there was not a breath of air, and very soon a light drizzly rain set in, the specimens taken on the previous day were preserved. At 10 a.m. a light wind sprang up, so all sail was made, but very soon the boat was becalmed, and a light rain set in and continued for some time. Late in the afternoon a light breeze

blew from the S.E., and the yacht crept along the coast as far as the Maykor Channel. Samuel White writes: "The names and positions of these islands seem to be in much confusion, and the charts are quite useless."

After rounding the point of the supposed Maykor (according to the chart), but which was in reality Tragan, a number of canoes of various sizes were seen upon the shore. One was a prau of considerable size (about 20 tons). Near this craft, and close in shore, the anchor was let go in three fathoms of water. It was not long before a canoe put off from the shore, and came alongside the yacht. The crew, consisting of six men, propelled the canoe by means of short spoon-like paddles, chanting a song and beating a tom-tom. Besides the crew, the canoe or prau contained a native teacher in a complete suit of clothing excepting boots—he even wore white cuffs, two others accompanied him, who seemed subordinates. They could not speak a word of English, but could converse fairly well in Malay with the owner of the yacht. Referring again to my father's notes he says. "These men (the teacher and his assistants) confirm the statements of the last natives in calling the small nameless Islands on the chart Maykor. I asked them into the saloon, and gave them some tea and bread, and the three sat at the table and behaved in a most modest and becoming manner, but they are all great beggars. They wanted tobacco, then grog, and to test the various reports I have read upon this subject, I brought out a bottle of Rum 20, O.P., and poured out about a third of a tumbler for the principal man, who tossed it off without a grimace. I assisted the others to a good nip, which they seemed to relish, the head man then motioned to be permitted to give some of the crew a drop. I began to assist them, but he was desirous to help them himself, and took the bottle out of my hand, gave some of the crew a very tiny drop, passed the bottle over the side into the prau, then after shaking hands all round, left with the bottle. Having given orders to have a boat lowered, Samuel White went over the large prau to see if he could get any information in reference to the islands, and in his notes he says: "The Captain and owner of the prau and several of his crew came back with me on board, they stayed an hour or more while I showed him the charts. He seemed quite familiar with all the Islands and places between Sumatra and the New Guinea Coast. He was a very intelligent man, and I was much taken

with his open countenance and manly bearing, as well as with his quiet and unobtrusive demeanour. Owing to this man's superior intelligence I was able to gain much information about many things, the prau in which this man has to make a voyage of twelve or fourteen weeks' duration, was a strange looking craft forward, for one fourth of her length she was low—not two feet from the water, she then rose abruptly to more than three times that height, which was carried on to her stern, on each quarter about eighteen inches from the water, was a square hole, through which rudders projected into the water, which were worked from inside.

The next day being Sunday, the yacht remained at anchor, and all hands remained on board. There was plenty of amusement all day, for the craft was full of natives of all kinds from daylight till dark. Several of the native teachers came off dressed in their best, and one, a tall and rather intelligent man, could speak a little Dutch, and he told my father that there were four islands in a line from South to North.—Tragan, Watali, Maykor, and another small island round the North end of Maykor. There was plenty of trade offered. One man bartered four pearls for 2,800 rupees. Other items for sale were tortoise shell, birds nests, cocoanuts, eggs, fowls, parrots, pigeons, paradise plumes, etc., etc., very long prices were asked for everything, and money was the trading article. Ten plumes were purchased for 20 shillings each. Several more were offered, but were refused, 16/ and 18/ each for them. The saloon was crowded with natives for hours, but no attempt was made to thieve, nor was anything lost, they were remarkably well behaved, but as previously mentioned, great beggars. Some wanted salt, some tobacco, some soap, whilst others wanted a little of everything, and all clamoured for grog. Amongst the visitors was a merchant, connected with the trading prau, a slight and sickly yellow man, with a few light clothes around him. He was accompanied by his wife and two children. The lady had a piece of coloured calico thrown loosely round her, the children were better dressed, a little girl of eight or nine years, having a clean loose frock of coloured calico drawn around the neck, and the other, a chubby-faced boy of ten or eleven years, wore a white calico shirt, and pyjamas, with a blue calico head dress. The wife and children were a warm dark brown, the wife being most likely an Aru woman. It seemed the universal custom to shake hands. The little girl appeared first, and

after shaking hands with my father, presented him with a little papiermache box, containing twelve bright-looking pearls, and he says in his notes: "I ascertained that this was a present, I took them all three below to the saloon, and made them presents of coloured calico, handkerchiefs, beads, jam, knives, etc., at which they appeared very pleased. The merchant had a few large but dull pearls for me, for which I gave him rice and jam, whereupon he showed much pleasure, and hugged me round the neck repeating the word "Rajah" many times, a name by which I am addressed by all here.

They were all remarkably quiet and well-behaved. I was called on deck to see a man who could speak English, but I soon found out that his English was confined to five words, three of which were blasphemous ones. The number of plumes of *P. apoda* offered to-day, go to show that this beautiful bird is not yet extinct, and I hope before long to meet with them in their native forests. No King birds of Paradise had yet been offered, although Wallace said they were plentiful when he visited these Islands." The weather was calm with light rain. The next morning, the 28th, light rain was falling, but in spite of this Samuel White ordered out a boat, and was landed upon a jutting piece of the coastline, covered in thick scrub. The land was very low and wet, which made collecting very difficult, for all this part of the island was densely wooded.



W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.



J. A. Riley
Part 3.

Vol. III.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st JULY, 1917.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., Ch.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd.,

Grenfell Street, Adelaide.

CONTENTS.

	PAGE
South Australian Ornithological Association	55
Order Passeriformes, Family Meliphagidae, Genus Myzantha	59
Tasmanian Field Notes. Edwin Ashby, M.B.O.U.	61
Birds of the North and North-West of Australia (No. 11). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	68
Notes on the Food and Temperatures of Cormorants	75
Notes on the Mallee Fowl (<i>Leipoa ocellata rosinae</i>)	78
Bird Notes. Re Robins at Stirling West	81
Note on the Little Black Cormorant (<i>Mesocorbo ater</i> —Lesson)	82
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	83

— THE —

South Australian Ornithologist.

VOL. III.]

1ST JULY, 1917.

[PART 3.

The South Australian Ornithological Association.

30th March, 1917.

The annual meeting of the South Australian Ornithological Association was held on Friday evening, 30th March, 1917, in the Royal Society's rooms. Dr. A. M. Morgan took the chair. He congratulated the acting Hon. Secretary (Mr. F. M. Angel) upon the effective manner in which he had performed his duties during the year.

The election of office-bearers resulted as follows:— President, Mr. A. G. Edquist; Vice-President, Capt. S. A. White; Hon. Secretary, Mr. R. Crompton (absent on active service); Acting Hon. Secretary, Mr. F. M. Angel; Publishing committee to the "South Australian Ornithologist", Dr. A. M. Morgan, the Hon. and Acting Hon. Secretaries, Capt. S. A. White, Mr. F. R. Zietz.

Dr. Morgan vacated the chair in favour of Mr. Edquist, who welcomed a distinguished visitor, Mr. W. B. Alexander, M.A. (Keeper of Biology in the Western Australian Museum). Mr. Alexander, in replying, stated that he had not been very long in Australia, and consequently was working hard to get a thorough knowledge of the fauna of the country. He took a keen interest in the birds. Mr. Alexander went on to say that he had been doing some work in Melbourne recently in connection with the Commonwealth Advisory Council of Science and Industry, and that he was now on his way back to Perth. He wished to tell the members that the Council was

glad to get the voluntary assistance of Capt. White to try and combat the possibility of the imported sparrows entering Western Australia by means of the East-West Railway. The Council now looked to Capt. White for advice in this important question. Capt. White, in reply, said he had taken this work upon himself, first, to try and save the western State from a scourge under which South Australia had suffered for a long time, and secondly to save our native birds that may be destroyed in ignorance for the imported pests. A member asked Mr. Alexander if the English starling had found its way into the west, and he replied that recently a starling had been sent to Perth for identification from the Albany district. This was in a fruit-growing area. Upon an official being sent down to investigate, he was told by a resident that a pair of birds had appeared, and had been under observation for some time, until they nested, when they were both shot, and one of them sent to Perth to be indentified. Upon the tree being felled with the nest, it was found to contain without doubt the eggs of starlings.

Mr. Mellor read some interesting notes upon the colouration of the young of the robin, and pointed out that it took only 14 days after three spots of colour appeared upon the young male robin's breast for the colour to spread all over the under surface. He also drew attention to the number of ants eaten by the white-throated tree-creeper, and to several species of birds nesting very late this year at Lockleys. He had seen many young in March.

Mr. Frank Parsons reported having seen several brush bronzewing pigeons (*Cosmopelia elegans affinis*) in the Mount Lofty Ranges.

Mr. E. Ashby exhibited a chestnut-breasted teal (*Virago castanea*), and drew attention to Mr. Alexander's paper in The Emu upon this bird.

Mr. T. P. Bellchambers handed in a paper upon the incubation of the mallee fowl eggs. It was agreed that this paper should stand over until next meeting.

The remainder of the evening was taken up by an account by Capt. White of his trip to Ooldea by way of the East-West Railway. A description of the country was given, and a small collection of birdskins was shown from this district. It was pointed out that most of the birds were somewhat small in comparison with eastern specimens.

27th April, 1917.

The monthly meeting of the South Australian Ornithological Association was held on Friday evening, 27th April, 1917, in the Royal Society's rooms. Mr. A. G. Edquist presided.

Several letters in reference to bird protection were discussed.

Dr. A. Chenery, of Wentworth, the well-known ornithologist, was nominated for membership.

Dr. A. M. Morgan exhibited a small collection of bird skins which he had collected during a recent trip up the River Murray. Among them were black-tailed parrot (*Polytelis anthopeplus*), southern yellow-throated friar bird (*Microphilemon orientalis didimus*), white-fronted honey eater (*Gliciphila albifrons*), white-rumped wood swallow (*Artamus leucorhynchus leucopygialis*), white-browed babbler (*Morganornis superciliosus*), white-browed treecreeper (*Climacteris superciliosa*), southern yellow-plumed honey eater (*Lichenostomus ornatus tailemi*), purple-backed wren (*Leggeornis lamberti assimilis*), white-face (*Aphelocephala leucopsis*), mallee brown-headed honey eater (*Melithreptus atricapillus mallee*), red-tipped Pardalote (*Pardalotinus ornatus*), yellow-rumped pardalote (*Pardalotus punctatus xanthopygus*). The doctor gave an interesting description of the birds that had been met with during his trip.

Mr. Arthur M. Lea, F.E.S., outlined some of his work in the examination of bird stomachs, and stated that there would be issued soon a publication containing the results of much of his research work. The Chairman and members expressed their great admiration for the extremely useful services Mr. Lea had rendered in this direction. Mr. Lea tabled a number of the bird stomachs he had already examined, and solicited further help from members in the way of material.

Mr. T. P. Bellchambers read further notes upon the mallee fowl and its nesting habits. He stated that incubation had been much retarded this season owing to the uncertain weather conditions. The longest period of incubation had been recorded, an egg having taken 99 days to hatch. Mr. Bellchambers was complimented upon the valuable character of his research work, and his notes were accepted with pleasure for publication in the next number of the association's journal.

Mr. F. R. Zietz directed attention to a statement in The Agricultural Gazette advising the killing of native birds to use for baits as a means of poisoning foxes. The Hon. Secretary was requested to point out that the killing of certain birds mentioned would be a breach of the law.

24th May, 1917.

The ordinary monthly meeting was held in the Royal Society's Rooms, on 24th May, 1917. The President, Mr. A. G. Edquist presided. Mr. Frank Hall, of Teatree Gully, tendered his resignation as a member on account of his inability to attend meetings or do any field work. The members expressed their deep regret at the loss of such a keen observer. Dr. A. Chenery, the well-known ornithologist of Wentworth, N.S.W., was elected a member. Mr. T. P. Bellchambers forwarded some interesting bird notes from Humbug Scrub. Several nests of white-plumed honey eater (*Ptilotula penicillata whitei*) were observed, containing eggs and young. A nest containing young of brown hawk (*Ieracidea berigora*) was noted, situated on top of mistletoe on Blue Gum. Several black-throated grebe (*Tachybaptus ruficollis novae-hollandiae*), and eight wood duck (*Chenonetta jubata*) were seen on the dam. The latter bird is getting very rare. Mr. F. R. Zietz reported the first flame-breasted robin (*Littlera chrysoptera phoenicia*) seen at Kingswood this season. On 7th May, Mr. J. W. Mellor recorded the same species at Reedbeds. At the end of April, 1917, Mr. W. Weidenbach reported having observed blue mountain parrots (*Trichoglossus novae-hollandiae*) in great numbers passing over Glen Osmond daily, and it was noticed that the birds were always flying in a south-westerly direction. Mr. Edwin Ashby noted a similar occurrence at Blackwood.

Sympathetic reference was made to the recent announcement of the death of Mr. A. J. North, C.M.Z.S., the renowned ornithologist of the Australian Museum, Sydney.

Messrs. Edwin Ashby and F. E. Parsons exhibited a small, but interesting collection of birdskins recently secured by them at Buckland Park, about ten miles north of Adelaide. A fine specimen of white-throated nightjar (♂) was shown, and attention drawn to the curious serrated toenail on each foot. Gilberts red-throated thickhead (*Pachycephala rufogularis gilberti*) was fairly numerous, but hard to detect. It is interesting to record this bird so near to Adelaide. Spec-

mens of the Lesser bush lark (*Mirafra javanica secunda*) were exhibited, and all were of the dark form. Red-rumped tit (*Acanthiza pusilla*) was taken from this locality, and Mr. Ashby showed for comparison skins recently collected by him at Cape Jervis—probably the same as the Victorian form—and also *Acanthiza pusilla hamiltoni* from Karoonda. It was noted that this bird from these three localities represented three distinct forms.

The birds for the evening's discussion were Cuckoo Shrikes (Mathews' List, Nos. 503 to 509). Specimens were exhibited from the South Australian Museum by Mr. F. R. Zietz, and from the private collections of Messrs. E. Ashby and J. W. Mellor. All the species in Mathews' list were represented, and skins from the different localities compared and discussed. From the material available the members were of the opinion that there was not sufficient variation to warrant the division of sub-species.

Order Passeriformes, Family Meliphagidae, Genus Myzantha.

Myzantha melanocephala whitei—The Noisy Minah.

Description—Upper Surface.—Forehead and lores, dull white; crown of head, black; ear coverts, dark grey; hind neck and sides of the neck, brown, finely barred with white, the lines becoming fainter and wider apart towards the shoulders; back, brown, each feather having a darker subterminal spot, giving the back a mottled appearance; lower back, faintly tinged with green; upper tail coverts, light brown.

Under Surface—Throat, dull white, with a streak of dull black down the centre; breast, grey, each feather having a subterminal band of brown, giving the breast a scaly appearance; abdomen and under tail coverts, dull white.

Wing—Primaries, dull black, distal portions of the outer webs and tips white, the proximal portions of the outer webs of the last three faintly tinged with green, basal portions of the inner webs broadly margined with white; secondaries, dull black, the outer webs broadly margined with yellowish green.

Tail—Two central feathers dark grey, tipped with light brown; the rest of the tail feathers dull black, largely tipped with dull white.

Legs and Feet—yellow.

Bill—Yellow.

Iris—Light brown, bare skin below and behind the eye, yellow.

Measurements—Total length of skin, 255 m.m.; wing, 145 m.m.; tail, 130 m.m.; bill, 18 m.m.; tarsus, 32 m.m.

The female resembles the male in colour, but is slightly smaller in all measurements. The young from the nest resemble their parents.

Distribution—This bird is found in all the Eastern States, but does not extend west of St. Vincent's Gulf, nor is it found in Kangaroo Island. Until about 25 years ago it was unknown in the Adelaide district, but since that time it has gradually extended along the foot hills from the Barossa Ranges until it is now fairly common, and is still extending its range over the plains, for it is only during the last three years that they have appeared at the Reedbeds, where they are now fairly numerous. They appear to have reached South Australia from the Murray, along the banks of which they are common, though they do not extend into the mallee country on either side of the stream.

Habits—They inhabit open forest lands fairly well, but not too thickly timbered. The high stringy bark hill country with thick undergrowth is not favoured by them. In the breeding season they are found in pairs, but when nesting has finished they go about in small flocks of five to ten in number. They are exceedingly noisy and animated birds, being always on the move uttering a great variety of notes and calls. They are very inquisitive and will peer down from the tree tops at anything strange, calling loudly to the rest of the flock who usually gather to join in the clamour. They are good mimics, and will at times give imitations of the calls of other birds.

Flight—Rather slow, straight and flapping, not undulating.

Song—A great variety of notes. When feeding they utter a clear bell-like note. Sometimes the whole flock will gather in the top of a tree and utter loud squawking notes, and at other times a shrill clear whistle. This last is the alarm note, and is uttered on the approach of a hawk or other enemy. They are occasionally a great nuisance to sportsmen, frightening up any game they may be stalking. On the other

hand the aborigines used to, and some sportsmen on the Murray still, make use of an imitation of this alarm call to bring high flying ducks to the water and within range.

Food—Largely consists of insects taken on the ground or captured in the air. The bird may sometimes be seen, especially in the evening, flying out from a tree and catching some fly or other insect, and returning to its perch to eat it. In the Eastern States they have a bad name as fruit eaters, but in South Australia have not done much harm in that respect up till yet, though the gardeners at the foothills say they are beginning to get a taste for soft fruits. They are known to feed on the berries of the African box thorn. Like the rest of the honey-eating family, they, of course, feed largely on the nectar of flowers.

Nest—This is built outwardly of small sticks and dry grass stems, lined with finer grasses and rootlets, and when procurable a little fur or sheep's wool. It is placed in the fork of a tree at varying heights from the ground, sometimes being at the top of the tallest available gum tree, and sometimes in a she-oak within reach of the hand. The birds are very silent about the nest, and when disturbed fly off very quietly. They are common hosts of the pallid cuckoo. The eggs are three in number, but four are not uncommonly laid. As many as six has been recorded, probably the product of more than one female.

Eggs—The eggs vary much in shape and in the distribution of the markings, but not in colour, which is fairly constant. A typical egg has a creamy white ground colour, in some instances flushed with pink, covered with irregularly shaped blotches of salmon pink, forming an indistinct zone at the larger end. Other eggs have the markings only at the large end in the form of a distinct ring, and others again are covered with small spots so as to almost hide the ground colour. Average measurement of 10 eggs—2.79 c.m. x 2.01 c.m. Largest egg, 2.90 c.m. x 2.05 c.m. Smallest egg, 2.65 c.m. x 2.00 c.m.

Tasmanian Field Notes.

BY EDWIN ASHBY, M.B.O.U.

The period covered is from 26th September, to end of first fortnight in October, 1916. Only a portion of my time was available for work amongst the birds. The travelling was done by motor.

Lathamus discolor tregellasi, Mat., (Swift Parrot), was during the period of my visit very numerous in the City of Hobart, feeding on the honey of the Tasmanian Blue Gum (*Eucalyptus globulus*), and also on another species of gum, a red flowering gum growing rather freely in the gardens. I was surprised not to meet with this bird in any of the localities visited outside of Hobart. On comparison with specimens collected by myself at Blackwood, South Australia, in July, 1914, I can find no difference, and conclude that the birds that visited South Australia had come from Tasmania. A female skua obtained in Hobart is in every respect similar, except a little brighter to the best male previously collected. There is evidently no difference in the sexes, either in colour or length of tail feather. In two short visits to the lower slopes of Mount Wellington (raining most of the time), a nest of *Cinclosoma punctatum dovei*, Mat., (the Tasmanian spotted ground bird), was met with. The bird was sitting on the usual deep cup-shaped nest placed at the foot of a grass tussock, the two eggs were quite fresh, and showed normal markings.

Sericornis humilis, Gld., (Brown Scrub Wren), was exceptionally numerous, many being in sight at a time quietly working for insects amongst the grass and leaves under dense tea-tree. Further up the gully amongst the tree ferns, although a few were noted, they appeared far less numerous..

Fine specimens of *Melithreptus validirostris*, Gld., (Strong billed Honey Eater), and *Melithreptus affinis*, Lesson, (Black-headed Honey Eater), were obtained. The note of the latter is very distinct from that of others of this genus. I took a lot of trouble to obtain a specimen that was feeding in the top of a lofty gum, thinking it was a bird I was unacquainted with.

The bush at the entrance of the gully was alive with birds, but as most of the species are noted from other localities, I will not refer to them now. The absence of *Myiagra nitida*, Gld. (Satin Flycatcher), which I had met with in the same localities in the first week of January some years ago, is interesting, showing that they had not arrived, or their striking notes would surely have been heard. While a few days were spent at Brown's River, between Hobart and the mouth of the Derwent, owing to a sprained ankle, I was unable to go into the scrub. Near the boarding house the two Diamond birds, *Pardalotus striatus*, Gmelin (Yellow-tipped Pardalot), and *Pardalotus punctatus leachi*, Mat. (Tasmanian Pardalot),

were working in the tall gum saplings, the note of the former was very similar to the South Australian bird, but one of the other species in addition to the familiar shrill double whistle, added a distinct double note which neither Mr. W. L. May, R.A.O.U., or myself had heard anywhere else in Tasmania. We hoped that it would have turned out to be the rare forty-spotted pardalot, but on shooting, it was found to be an adult male *punctatus*.

On 5/10/16, at Sandford, Southern Tasmania, I found a beautifully-made nest ready for eggs, of *Calamanthus fuliginosus*, V. and H. (Striated Field Wren), it was about 18 inches from the ground in a bunch of "samphire" alongside the coach road, built of grass, well-lined with soft feathers.

A very interesting visit was paid to Lake Sorell, which is situated on the elevated plateau which occupies such a large portion of the centre of the island. I was informed that the elevation of Lake Sorell was about 2,300 feet. The locality is exceedingly wild, the boarding house at Interlaken being the only inhabited place, I believe, in the 18 miles from Oakland. The ground oozed water on the slopes as well as on the flats, and the road was so bad that we did not venture to spend more than the night and half day there for fear that further rain would make the road back impossible.

All the smaller Tasmanian Honey Eaters were exceedingly numerous, and a fine specimen of the great Tasmanian or Brush Wattle bird, *Dryobornis paradoxus*, Dadin, was obtained.

The trip to Lake Sorell had been especially undertaken with the hope of obtaining the *Neo-Strepera versicolor arguta*, Gld. (Hill Crow Shrike), a bird that is known to frequent the Great Lake at an altitude of over 3,000 feet. From some fishermen I learnt that a few pairs of this bird were in the district, but that they became much more numerous as one ascended towards the Great Lake; on the other hand the Sooty or Black Crow Shrike, *Strepera fuliginosa*, Gld., was very common, and occurred at the Great Lake as well. I think they called the former the "Squeaker", from its note. I was up the next morning before daylight, and followed along the track around the Lake Shore, and one of the first birds I noted was the Hill Crow Shrike making the usual squeaking call of our *Strepera melanoptera*, a species that Gould considered it was so closely allied to, that he doubted whether he was justi-

fied in making it a distinct species, though Mathews now places it with the grey Crow Shrike.

The bird in question joined another, and I had almost stalked it within gun shot, in fact was raising the gun for a shot, when a third bird not before observed, gave the warning, and the three flew on to the top of a rocky knoll. Owing to the condition of my ankle I was unable to follow, and as no more put in an appearance later in the day, I am still without this species in my collection. The other species also peculiar to Tasmania, *Strepera fuliginosa*, was most numerous, its loud and weird cries reminding one more of the call of the Black Cockatoo than that of a Crow Shrike.

The common Tasmanian Tit, *Acanthiza pusilla diemanensis*, Gld. (Brown-rumped Tit), was numerous, but although a sharp look out was kept there was no sign of *A. ewingii*, Gld.

The country here near the lake is open forest country, with clumps of dense small bushes, and in places a heath-like shrub belonging to the "*Epacrideae*", probably a *Brachyloma*, was densely covering the ground under the larger timber, this shrub being 2 feet to 3 feet in height, and covered at the time of our visit with bright red berries, upon which numbers of the Green Parrot, *Platycercus caledonicus*, Gmelin, were feeding *Sericornis humilis*, Gld. (the Brown Scrub Wren), were numerous, mostly either on the ground or in low dense bushes. From the restlessness of a pair, I concluded that they must have a nest, and after searching carefully through all the possible bushes in the immediate neighbourhood, bethought me that it was possible that they might choose a similar nesting place to that of *Hylacola cauta*, Gld., which almost invariably selects a fallen branch with dead leaves still attached, as a nesting place. I quickly found a sapling that had been cut down, and on lifting up the fallen branches, there was the nest close to the ground buried in the fallen branch, and in construction a typical *Sericornis* nest containing three fresh laid eggs. This nest is now in the S.A. Museum.

After leaving Lake Sorell it had been our intention to spend a day at Ross, or one of the central townships for the purpose of endeavouring to obtain Tasmania's species of Grass Parrots, *Neonanodes chrysogaster*, Latham, (Orange-bellied Parrot), and *Neonanodes chrysostomus*, Kuhl, (Blue-winged Parrot). The neighbourhood had until recent years been a well known breeding place for both these species. Whereas until

recent years these parrots, especially the latter, used to appear at harvest time and after, in hundreds, right through the centre of the island as far south as Sandford on Frederick Henry Bay. Particular enquiries made in a large number of the townships elicited the fact that instead of hundreds only a few pair now visit their old feeding grounds. Several of my informants ascribed this decrease to the methods adopted in the free distribution of poison for killing rabbits. On going north we saw no sign of these parrots, but Mr. W. L. May saw a pair alongside the main road in Epping Forest, on the return trip.

A hasty visit was paid to Scottsdale, in the north east of the island. At an altitude of nearly 2,000 feet, on what is known as the "Sidling", bird life was most numerous. *Acanthornis magnus*, Gld. (Scrub Tit), was here first met with. Several Pink-breasted Robins, *Erythrodryas rhodinogaster*, Drapiez, were noted, and more Olive Thickheads, *Timixos olivaceus*, V. and H., were heard whistling at one time than I have ever heard before. The *Acanthiza* was still the common one, and not *A. ewingii*. There was a bare hour available for searching this scrub so rich in bird life, and drenching rain precluded any further search if more time had been available.

The night was spent at Scottsdale, and a visit was paid to one of the many swamps in this district next morning. The grunting notes of Rails were heard in the Cutting Grass about five feet high, and although they could have been only a yard or so away, some times only a few feet, only once was the bird seen, apparently *Porzanaidea plumbea maculata*, Swainson, (Eastern Spotless Crake), and I was fortunate enough to find a nest of this species containing five eggs almost fresh. The nest was neatly made of grass about two feet above the water in the centre of a tussock of cutting grass; the cutting grass well overhung the nest, screening it from view. The photo taken of the nest was unfortunately a failure. Of the eggs, four were covered with fine spots and lines, and one with much larger blotches. The parent bird kept within a few yards of the nest for half an hour, sometimes on one side, and sometimes on the other, but not once did I get a glimpse of it. Another interesting bird met with in this swamp was the Tasmanian Emu Wren, *Stipiturus malachurus littleri*, Mathews. Several were seen, both cocks and hens, and one cock bird secured. Only about two hours was spent here, but it would have well repaid a stay of a few days.

Near Myrtle Bank in the heavy timbered country large numbers of the Tasmanian Black Cockatoo, *Calyptrorhynchus funereus alanthanotus*, Gld., were seen, their wailing cries as they flew from tree top to tree top, were quite in keeping with the lonely wildness of the big forest scenery.

The next collecting was done in the neighbourhood of Latrobe, North-West Tasmania. I stayed with friends whose home is on the banks of the river Mersey. At early dawn the flute-like whistle of the Grey Butcher Bird, *Bulestes torquatus cinereus*, Gld., was heard, a pair having built in a tall gum on the property; also the loud cry of the Native Hen, *Tribonyx mortieri dubius* in the adjoining swamp, and one was seen on the green flat just below the garden.

Several pair of the splendid Tasmanian Yellow-throated Honey Eater, *Nesoptilotis flavicollis flavigula*, Gld., kept up their song (full melodious notes can be described as a song), throughout most of the day from the saplings and wattles along the river bank; but a careful search did not disclose a nest, may be it was a little too early. On donning a pair of "waders", a swamp situated between the Mersey proper and an old channel, now a start of backwater, was explored. A number of old nests or "seats" of the Native Hen were noted on little islets or large tussocks standing out of the water; in only one were eggs found. Later in the day a second visit was paid, and in spite of the greatest care, no sight was obtained of the bird, which must have been sitting, as the eggs were quite warm; three eggs were in the nest and two floating in the water near by. At first I thought the hen in hurrying off the nest must have dragged them out, but as all the five eggs were badly rotten, I think a recent flood that had taken place some fortnight, or nearly so, before, must have drowned the eggs; in spite of their condition, fair specimens were made of the eggs. The next day a swamp higher up this old river channel was visited, and I found another nest also in a tussock, containing the usual clutch of five eggs, the bird was sitting close. This nest which was made of grass similar to the previous one, was exceedingly well screened with the long blades of the cutting grass which arched right over the nest, the birds having made a means of ingress and egress both back and front of the nest, so that from which ever direction the disturbance came, the sitting bird could slip out by the other door. This, it was able to do so effectively, that several attempts failed to reveal the bird. These eggs

were bad, although a dead chicken in a fairly advanced state of development was found in several of them; no doubt the same flood was accountable for this. One wonders how long the birds would continue to sit on rotten eggs. Several Tasmanian Bald-Coots, *Porphyrio melanonotus fletcheræ*, Mat., were seen in the swamps, but none obtained.

During my stay at Latrobe, a gorge of the Don river, was visited. Near the entrance of the gully feeding on the grassy flats along the banks of the stream were numbers of Dusky Robins, *Amaurodryas vittata*, Quoy et G. A nest of one was found containing three chicks and one unhatched egg. The nest was placed at the base of a few shoots coming out of an almost dead tree, about five feet from the ground. The parent bird was quite undisturbed at our presence, and allowed itself to be photographed without any concern, its great black eyes watching us with keenest interest. It only left the nest when one's hand was almost touching it, and returned again to the nest while we waited. A number of brilliant plumaged Fire-tailed Finches, *Zonaeginthus bellus*, Lath., were in some thick trees and brambles growing along the banks of the creek, but neither of these birds were met with in the damp precipitous sided gorge itself; the sides of the gorge were covered with tall timber and dense undergrowth and ferns, some of the timber being myrtle. In the gorge were Olivaceous Thickheads, *Acanthornis magnus*, Gld., and Pink-breasted Robins were in considerable numbers. Always close to river itself I should think there must have been a fresh pair every hundred yards. A lovely nest of this species was found in a fork of a sapling overhanging the stream. The nest was beautifully made of moss, ornamented with lichen, the moss exactly corresponded with the mossy covered boughs to which it was attached. The moss of the nest was as moist and green as was the growing moss on the tree stems. I left the nest till the day before I was leaving Tasmania, but no eggs were laid; no doubt it was a little too early in the season.

Perhaps the most important find in this gully was that of *Acanthiza ewingii*, Gld., the Tasmanian or Ewing's Tit. Four nests were found all in forks of tea tree overhanging the running water (a typical mountain trout stream). Mr. W. L. May, who was with me, and who was very familiar with the nests, notes, and habits of the common Tasmanian Tit, *Acanthiza diemenensis*, told me that these nests were absolutely different

both in construction, material, and situation to the nests of the common bird; the note is also distinct, but the bird itself requires a close inspection to distinguish it. The most marked difference is the absence in *ewingii* of the pale freckled marks on the forehead, and the more rufous crown of the head. Two of the nests contained young, one was empty, and one contained four fresh eggs, three of which are sprinkled with reddish spots chiefly at the large end, and one egg was quite white. The male bird and eggs are in my collection, and the nest in the S.A. Museum. The birds with young were not interfered with.

In the neighbourhood of Latrobe most, if not all, the commoner scrub birds of Tasmania were noted. Specimens of the North Tasmanian Blue Wren, *Malurus cyaneus fletcheræ*, Mat., were secured, but on comparison with skins taken by myself in the south part of the island, I can find no difference, although Mr. Mathews separates the two into separate subspecies. Dates of nests referred to as under:—

7/10/16.—*Sericornis humilis*, Lake Sorell.

8/10/16.—*Pozanoidea plumbea immaculata*, Mat., Scottsdale.

27/9/16.—*Cinclosoma punctatum dovei*, Mat., Hobart.

10/10/16.—*Tribonyx mortieri*, Latrobe.

11/10/16.— " "

12/10/16.—*Acanthiza ewingii*, Latrobe.

12/10/16.—*Erythrodryas rhodinogaster*, Latrobe.

Birds of the North and North-West of Australia.

From Notes and Skins made by the late Capt. T. H.
Bowyer-Bower.

[BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., ETC.,]

No. 11.

126. DUCORPSIUS GYMNOPSIS SUBDISTINCTUS. North-Western
Bare-eyed Cockatoo.

Cacatoes sanguinea subdistinctus (Mathews). Nov. Zool.,
Vol. XVIII., p. 265, 1912. Parry's Creek, North-West Australia.

No. 205—♂. Length, 18 inches (28/6/86).

Irides, brown; eyelash and space round the eye, light blue lead colour, covered with whitish powder; bill, white, tinged with bluish yellow; feet and legs, mealy lead colour.

No. 226—♂. (6/7/86).

No. 251—♂. Length, 16 inches (14/7/86).

These are very common about Derby. Every morning a flock of some four or five hundred arrive about 11 a.m. and remain till about 5 p.m. The trees are white with them, and when they pitch on the smaller ones the effect is like a May-tree in full flower. All at once they take to the wing together, looking like snow, driven before a high wind; occasionally some 20 or 30 come down to the lagoon to drink, and then they seem to increase the number of water-lilies. They are a noisy bird, and seem always on the lookout. When one is wounded and on the ground shrieking, others come round their fallen comrade.

127. *EOLOPHUS ROSEICAPILLUS DERBYANUS*. Pallid Rose-breasted Cockatoo.

Cacatoes roseicapillus derbyanus (Mathews). Nov. Zool., Vol. XVIII., p. 266, 1912. Derby, North-West Australia.

No. 105—♀. Length, 13.3 inches.

Irides, pink; bill, white, bluish at the base; orbital space, pinky-red; feet, grey.

128. *LEPTOLOPHUS AURICOMIS INTERMEDIUS*. Western Cockatoo Parrot.

Leptolophus auricomis intermedius (Mathews). Nov. Zool., Vol. XVIII., p. 267, 1912. Point Torment, North-West Australia.

No. 125—♀. Length, 12.3 inches (14/6/86).

Irides, brown; bill, bluish-horn colour; feet, nearly black.

No. 129—♀. Length, 12.5 inches (14/6/86).

Irides, brown; bill, bluish-horn colour; feet, nearly black.

No. 343—♂. Length, 12.6 inches (31/7/86).

Irides, brown; bill and cere, lead colour; legs and feet, brownish-black.

No. 346—♂. Length, 12.4 inches (31/7/86).

These birds go in flocks of from twelve to twenty or thirty. They arrive every morning and evening to drink. They keep flying round and round before drinking, often going down near the ground, and then mounting in the air again. They often perch on dead or naked trees.

130. *APROSMICTUS ERYTHROPTERUS PARRYENSIS*. Western Red-winged Parrot.

Aprosmictus erythropterus parryensis (Mathews). Nov. Zool. Vol. XVIII., p. 268, 1912. Parry's Creek, North-West Australia.

No. 145—Length, 12.6 inches (17/6 86).

Irides and bill, vermillion; feet, mealy black.

No. 364—♂. Length 13 inches (3/8/86).

No. 376—♂. Length, 12.9 inches (7/10/86).

No. 377—♀. Length, 13.3 inches (7/10/86).

No. 388—♂. Length, 13. inches (11/10/86).

Irides brown next the pupil, pale orange outside; eyelid, brown; bill, orange at the tip, becoming red at the base; nostrils, orange; legs and feet mealy black.

No. 389—♀. Length, 13.6 inches (11/10/86).

Irides, brown next the pupil, with an outer ring of orange; eyelid brown: bill dull yellow at the base, shading into reddish-brown at the base; legs and feet mealy black.

142. *PODARGUS STRIGOIDES DENDYI*. Western Freckled Frog-mouth.

Podargus strigoides dendyi (Mathews). Nov. Zool. Vol. XVIII., p. 283, 1912. Derby, North-West Australia.

No. 38—♂. Length, 17½ inches (22/5/86).

Irides, reddish-yellow; bill and feet, olive brown; inside of mouth, fine yellow.

No. 186—♂. Length, 16.3 inches (26/6/06).

This bird was flushed from the ground where two specimens of *Cracticus* were flying round him as though they could not make him out.

No. 447—♂. Length, 16.5 inches (26/10/86).

Irides, yellow, deeper on the outer circle; bill, light brown, with a yellowish white hue on the culmen, but the whole dirty and much stained; legs and feet, olive brown.

No. 448—♀. Length, 15 inches (26/10/86).

Similar to male.

The nest was a small structure about four inches across, placed at the end of a branch of a leafless "boa-bab", and was composed of a few twigs very roughly put together. One of the adults was on the nest, and so much resembled a piece of wood, that had it not been sitting or rather standing the reverse way to which a fork would generally grow, it would not have been noticed. Its feathers all appeared closely drawn in, and the bird seemed to have extended itself to its utmost length, with the head and bill in one line with the body. Its mate, probably the male, was on the same tree, and no movement betrayed life in them; the sitting bird slowly turned its head as the tree was approached, when the cock flew off, and soon afterwards the sitting bird. The two young ones in the nest were covered with a white down, but not so thickly as in the case with owls. The bills were of a bluish-white colour, and the legs white. One was considerably larger than the other, and made a short hissing noise of a very quiet kind. The nest was fully exposed to the full rays of the mid-day sun. The larger young one flew from the nest, when next visited, and crawled under some dead grass, and was found with difficulty. It made a curious trembling cry for food. They open bill and wings and snap at the intruder, after the manner of owls. They have not the owl motion about the head, but look most like these birds when they place themselves in a defensive attitude, spreading wings and moving the head about rather snake-like.

No. 449—♂. (Young). Length, 9.3 inches (27/10/86).

Irides, light ochre; the pupil has a bluish slate tinge; bill, light brown, with a slight leaden hue at the tip of the upper mandible.

No. 451—♂. (Young). Length, 8.5 inches (27/10/86).

Similar to the above (perhaps from the same nest).

No. 498—♀. Length, 15.1 inches (3/11/86).

144. *AEGOTHELES CRISTATA RUFÆ*, Rufous Owlet Nightjar.

Acgotheles rufa (Hall). Veit. Nat. Vol. XVIII., p. 89, 1901. Derby, North-West Australia.

No. 424—♀. Length, 9.3 inches (22/10/86).

Irides, dark brown; bill, brown, flesh colour on under mandible, and cutting edges lighter; legs and feet, flesh colour; toes, brown.

145. EURYSTOMUS ORIENTALIS BRAVI. Western Dollar Bird.
Eurystomus orientalis bravi (Mathews). Nov. Zool., Vol. XVIII., p. 285, 1912. Parry's Creek, North-West Australia.

No. 406—♂. Length, 11.4 inches (17/10/86).

No. 456—♂. Length, 11.3 inches (27/10/86).

Irides, dark brown; eyelid, reddish brown; bill, vermillion, with tip of upper mandible black; legs and feet, coral red.

148. DACELO LEACHII OCCIDENTALIS. Western Fawn-breasted Kingfisher.

Dacelo occidentalis (Gould). Proc. Zool. Soc. (Lond.), 1869, p. 602. Derby, North-West Australia.

No. 42—♂. Length, 16 inches (24/5/86).

Irides, white; bill, upper mandible, brown, lower, yellowish white; feet, pale olive.

This bird, though not rare, is very wild and difficult to get within range of it. Its note is quite different from *Dacelo leachii*, but not so much laugh about it as *Dacelo gigas*, and I have not heard it give that kind of barking note which *D. leachii* does on leaving a tree. Its note is heard early in the morning, and occasionally during the day, but chiefly some time after the sun has set.

No. 60—♂. Length, 16.4 inches (29/5/86).

Irides, white; upper mandible, dark brown; lower one, yellowish white; feet, olive.

No. 104—♀. Length, 17.5 inches (6/6/86).

Irides, white; upper mandible, brown; lower, fleshy white; legs and feet, pale olive. This bird was shot after sundown, and while the moon was giving a fair light. There were two, laughing away; when disturbed they flew to another tree, and the "bark" like that uttered by *D. leachi* was heard for the first time.

No. 114—♀. Length, 16.5 inches (8/6/86).

Irides, grey.

No. 228—♂. Length, 16 inches (7/7/86).

Irides, whitish; legs, olive.

No. 309—♂. Length, 16.1 inches (13/9/86).

Irides, white; upper mandible, brown; cutting edges, horn colour; lower mandible, whitish-brown, darkest at the sides of the base; legs and feet, light olive.

No. 311—♀. Length, 16 inches (13/9/86).

Similar to the above.

No. 341—♂. Length, 16.5 inches (18/9/86).

Irides, white; upper mandible, brown, passing into yellowish white at the tip and on the cutting edges; lower mandible, white, with a brown patch on each side at the base; legs and feet, yellowish olive.

No. 343—♂. Length, 16.2 inches (18/9/86).

Similar to the above.

No. 390—♂. Length, 16.3 inches (11/10/86).

148. CYANALCYON MACLEAYI PUBLA. Forest Kingfisher.

Halcyon macleayi publa (Mathews). Austral. Av. Rec., Vol. I., p. 38, 1912. Northern Territory.

No. 6—♂. (8/5/86). Palmerston.

149. CYANALCYON PYRRHOPYGIUS OBSCURUS. Northern Red-backed Kingfisher.

Halcyon pyrrhopygius obscurus (Mathews). Nov. Zool., Vol. XVIII., p. 288, 1912. Parry's Creek, North-West Australia.

No. 1—♂. Length, 8.6 inches (Palmerston, 8/5/86).

Irides, black; upper mandible, black; lower, pearly white on the basal half, remainder, black; feet, olive brown.

No. 2—♂. Length, 9 inches (Palmerston, 8/5/86).

Irides, black; upper mandible, black; lower, pearly white on the basal half, remainder black; feet, olive-brown.

No. 31—♂. Length, $9\frac{1}{4}$ inches (21/5/86).

Irides, brown; upper mandible, black; lower, with basal half, white; remainder, black; legs, olive.

No. 34—♀. Length, $9\frac{1}{4}$ inches (21/5/86).

No. 159—Length, 9.3 (21/6/86).

No. 96—♀. Length 9 inches (5/6/86).

No. 274—Length, 9.3 (4/9/86).

150. COSMAEROPS ORNATUS SHORTRIDGEI. Western Bee-Eater.

Merops ornatus shortridgei (Mathews). Nov. Zool., Vol. XVIII., p. 290, 1912. Strelley River, West Australia.

No. 4—Length, $10\frac{1}{2}$ inches (Palmerston (18/5/86).

No., 137—♀. Length, 8.6 inches (16/6/86).

Irides, crimson; bill and feet black.

No. 139—♀. Length, 9.1 inches (16/6/86).

No. 157—♂. Length 10 inches (19/6/86).

No. 271—♂. Length, 10.4 (17/7/86).

151. *EUROSTOPODUS ARGUS* HARTERTI. Northern Spotted Nightjar.

Eurostopodus argus harterti (Mathews). Nov. Zool., Vol. XVIII., p. 291, 1912. Northern Territory.

No. 240—♀. Length, 12 $\frac{1}{4}$ inches (11/5/86).

Irides, dark brown, with a large black pupil; eyelids, fleshy brown; bill and feet, brown. This bird was shot on board the S.S. Menmuir, about five miles from Point Torment. It was flying round the ship for some time, it was quite light, being about 6.30 a.m.

No. 165—♀. Length 11.9 inches 21/6/86).

In the evening these birds fly about, keeping low, and by the edge of the lagoon.

No. 190—♀. Length, 11.6 inches 26/6/86).

No. 351—♀. Length, 11.5 inches (1/8/86).

Common in the evenings. They stay during the day in small hollows in the ground, and are with difficulty distinguished. On the wing their flight is noiseless and quick, particularly in their sharp turns.

No. 368—♀. Length, 11.6 inches (3/8/06).

No. 382—♂. Length, 12.3 inches (7/8/86).

No. 387—♀. Length, 12.2 inches (10/10/86).

No. 519—♂. Length, 12. inches (5/11/86).

154. *CUCULUS OPTATUS*. Oriental Cuckoo.

Cuculus optatus (Gould). Proc. Zool. Soc. (Lond.), 1845, p.

18. Port Essington, Northern Territory.

No. 10—8/5/86, Palmerston).

Eye, yellow, bill, olive; lower mandible, lighter; feet, olive green.

No. 126—♂. Length, (14/6/86).

Irides, dark brown: eyelid, yellow; bill, brown; olive at the base of the lower mandible; gape yellow; feet, olive brown.

No. 223—♂. Length, 12.2 inches (27/8/86).

No. 248—♀. Length, 11.4 inches (14/7/86).

Irides, clear brown; eyelash, bright yellow; bill, upper mandible, brown, lower, dull yellow; gape, bright yellow; feet, mealy black.

No. 425—♂. Length, 12.4 inches (22/10/86).

Irides, dark brown; eyelid, yellow; bill, brown; olive at the base of the lower mandible; gape and the inside of bill, reddish yellow; legs and feet, olive brown.

Notes on the Food and Temperatures of Cormorants.

By A. M. MORGAN, M.B., Ch.B.

Thanks to the hospitality of Messrs. A. G. and E. Rymill, Capt. S. A. White and I were able to make some further observations upon the orange faced and little pied cormorants.

Leaving Port Adelaide on the evening of March 22nd, the night was spent at the Outer Harbour. Next morning, after getting a supply of cockles for bait, a start was made for the flats to the north of the Port River, a little fishing being done on the way. The afternoon was occupied in investigating some of the mangrove swamps in search of cormorant rookeries, several of which were found, and seventeen specimens secured. Saturday morning was spent in dissecting and measuring the specimens, and the afternoon ashore at Port Gawler in investigating some of the land birds. Next day, March 25th, a return was made to Port Adelaide.

Two species only of cormorants were seen—the orange faced *Hypoleucus varius hypoleucus*, and the little pied *Microcarbo melanoleucus*—neither of which was nesting. Generally speaking, these two species occupy separate roosting places, though a few of the orange-faced birds are usually found in the flocks of the little pied and vice versa. Twelve orange faced birds were secured, and their temperatures taken as soon as they could be collected, none being taken more than ten minutes after death, and some wounded birds while still alive. The temperatures were as follows:—

I.A.M.=*in articulo mortis*; A=alive; D=dead.

1.	106.2	I.A.M.	7.	109.	D.
2.	106.4	I.A.M.	8.	106.	D.
3.	105.2	I.A.M.	9.	109.	A.
4.	105.	I.A.M.	10.	109.6	D.
5.	106.2	I.A.M.	11.	108.6	D.
6.	105.4	D.	12.	107.6	D.

Measurement in c.m., weight in lbs.

	Total length.	Spread.	Wing, Axilla to tip.	Wing, Carpus to tip.	Bill.	Tarsus.	Weight.	Sex.
1. . .	83.50	129.90	58.25	32.25	7.60	7.60	5 $\frac{1}{4}$	♂
2. . .	79.75	126.75	55.60	31.75	7.60	7.00	4	♂
3. . .	81.00	128.00	56.75	31.25	7.40	7.60	4 $\frac{1}{2}$	♂
4. . .	74.75	121.75	53.25	29.25	6.50	7.00	3 $\frac{1}{2}$	♀
5. . .	75.80	118.25	53.25	29.50	6.50	7.30	3 $\frac{3}{4}$	♀
6. . .	82.25	126.75	56.75	31.75	7.00	7.00	3 $\frac{3}{4}$	♂
7. . .	81.00	133.00	58.75	31.75	7.00	7.60	5	♂
8. . .	78.30	126.75	56.00	30.75	7.40	7.40	4 $\frac{1}{2}$	♂
9. . .	81.00	128.75	56.75	31.25	7.40	7.00	4 $\frac{1}{4}$	♂
10. . .	83.50	131.75	58.25	30.40	7.40	7.60	4 $\frac{1}{2}$	♂
11. . .	78.30	124.75	55.25	29.25	6.50	7.00	4	♀
12. . .	81.00	128.00	58.00	31.75	7.00	7.00	4 $\frac{1}{2}$	♂

STOMACH CONTENTS.

1. Leather jacket bones, weed fish, trumpeter.
2. Fish remains, unidentifiable.
3. Empty.
4. Fish remains, unidentifiable.
5. Parasitic worms, fish remains.
6. Portions of squid, box fish.
7. Shrimps, small shell, brown weed fish.
8. Parasitic worms, box fish, brown weed fish.
9. Shell grit, fish remains.
10. Shell grit, box fish, weed fish, large fish not identified, leather jacket.
11. 1 flathead, 9 green weed fish.
12. Fish bones, seaweed, parasitic worms.

Leather jacket (*Monacanthus sp.*), box fish (*Aracana sp.*), brown weed fish (*Odax balteatus*), green weed fish (*Odax waterhousi*), flat head (*Platycephalus sp.*), trumpeter (*Atypichthys strigatus*).

From the material examined Capt. White and myself have been able to make out the colour changes of the bill and bare skin of the face in the full grown birds of this species. The colours of the soft parts of the nestling have so far as I know, not yet been recorded, neither is it known whether the birds breed before attaining their full nuptial dress, nor if they lose the colours after the breeding season.

First stage:—The bill, face, and gular pouch are of a uniform dull light yellow. Birds in this stage are undoubtedly immature, though full grown, as the measurements show.

Second stage:—The orange spot in front of the eye appears, and the ridge of the bill becomes light horn colour.

Third stage:—The blue over the eye appears, the culmen and gular pouch are darker.

Fourth stage:—The green under the eye appears, the gular pouch and ridge of the bill are much darker.

Fifth Stage:—The gular pouch and proximal portion of the ramus of the lower jaw become deep purple, and the bill nearly black. This is apparently the full breeding plumage, for most of the birds in this condition showed signs of breeding on dissection. They did not, however, all show them, so this point still remains uncertain.

The colours do not differ in the sexes.

Five specimens of the little pied cormorant were secured. Their temperatures were:—

1.	105.2	D.	4.	106.0	D.
2.	107.0	D.	5.	105.4	D.
3.	107.0	A.			

Measurements in c.m., and weight in lbs.

	Total length.	Spread.	Wing, Axilla to tip.	Wing, Carpus to tip.	Bill.	Tarsus.	Weight.	Sex.
1. . .	58.75	87.25	41.75	23.75	3.80	3.80	1½	♂
2. . .	58.25	87.25	40.50	24.25	3.80	3.80	1	♂
3. . .	57.00	89.25	40.00	22.75	3.30	3.30	1	♀
4. . .	57.00	88.00	39.50	24.00	2.80	3.80	1¼	♂
5. . .	62.00	97.50	44.25	25.50	3.50	4.50	1½	♂

STOMACH CONTENTS.

1. Two weed fish.
2. Eight small crabs.
3. Remains of small fish.
4. Small fish.
5. One brown weed fish.

In the stomachs of the 17 specimens examined, one example of a marketable species was found, viz.: a small flat-head: unfortunately so much digested that the species could not be determined. The so called trumpeter is not the valuable edible fish of Tasmania and the Eastern States, but a non-marketable fish bearing the same name locally.

Notes on the Mallee Fowl (*Leipoa ocellata rosinae*).

No. 2.

By T. P. BELLCHAMBERS.

Nesting seasons—1916-17.

Comparing incubation notes of season 1915-17 with the previous season, a great difference is seen, which I believe to be due to abnormal climatic conditions. During the last season, 1913-14, the birds commenced to lay August 19th; this 1916-17 season the first egg was laid August 15th; 1913-14 season 22 eggs were laid by December 12th; yet this year 23 eggs were laid up to the last week in January. In 1914 the first chick was hatched on December 3rd; in 1917 the first bird was not hatched till February 12th. The season before five eggs failed to hatch; while this season there were sixteen failures amongst the earlier laid eggs; in 1914 eleven chicks were hatched out of a possible fourteen; this year only seven chicks came out, all very late in the season, 71 days later than previous season.

The incubation periods also show a very marked difference, the longest period this season being 99 days, as compared with 77 in 1914; the shortest being 62 days, compared with 55 in 1914.

The last five eggs laid failed probably owing to the low temperature of the mound.

The following temperatures were taken on two occasions only:—

February 26th, 12.30 p.m.	Over egg chamber ..	85° Fahr.
February 26th, 12.30 p.m.	In sun	70° Fahr.
March 8th, 2 p.m.	Egg chamber	93° Fahr.
March 8th, 2 p.m.	In sun	118° Fahr.
March 8th, 2 p.m.	One inch under surface ..	124° Fahr.
March 8th, 2 p.m.	Six inches under surface ..	117° Fahr.

Chicks were hatching under these conditions.

About the last week in March, 1917, the birds ceased working on the mound. April 20th, the birds showed indications of opening up the mound. Going to their assistance, I removed ten sound eggs and one broken one. Ten eggs had been removed from the mound during the season for various reasons. Seven hatched out.

It is interesting to note that on opening the mound on February 16th, I broke the egg numbered 16; taking the top clean off, but the membrane was not injured, I repaired the egg by using the shell of a common hen's egg for the purpose, using a strip of paper to keep it in position. It was very gratifying to see the chick from this egg on the surface the following day.

Birds were observed on April 21st to be filling in the pit with all available material, such as decayed wood, sticks, etc. In the evening I emptied a large bag of gum leaves into the aviary. Nearly all the material was placed in the pit by eight o'clock next morning. Notice was taken of the fact that the bed of the new pit was being placed above the old one. Last season the old material was thrown out, and later on incorporated with the new, this will bring the floor of the egg chamber still higher above ground level, and should make it drier and warmer.

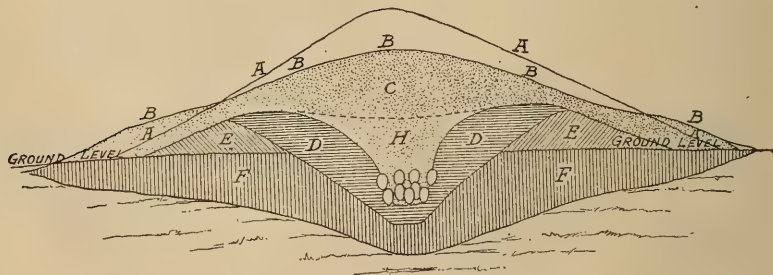
The following are the incubation notes for this season, 1916-17, each egg being numbered as laid:—

No of eggs	Date laid	Date of hatching	Period of incubation.
1.	August 15	} eggs removed.	
2.	August 21		
3.	August 29		
4.	September 3		
5.	September 9		
6.	September 15		
7.	September 19		

No of eggs	Date laid	Date of hatching	Period of incubation.
8	September 24	broken	
9.	September 30		
10.	October 4	broken	
11.	October 11		
12.	October 18		
13.	October 24		
14.	October 30		
15.	November 4		
16.	November 9	February 16	99 days
17.	November 15		
18.	November 21	February 15	86 days
19.	November 26	February 18	84 days
20.	December 8	February 12	66 days
21.	December 15	February 15	62 days
22.	December 22	February 22	62 days
23. Not known		March 8	
24. Not known.			
25. Not known.			
26. Not known.			
27. Not known.			
28. Not known.			

The feather phase of chick is as under:—

Chick hatched March 8th; tail feathers made their appearance on April 1st; on rump, April 6th; on back, April 7th; on head and throat, April 14th; on breast, April 17th; upper tail coverts, April 20th; by February 12th no change had taken place in flight feathers; first flight feathers seem to have power of growth. The chick evidently merely puts on an overcoat, the first feathers remaining under the new; oldest chick was shedding flight feathers on June 2nd.



Section of mound of *Leipoa ocellata*.

Scale—1 inch to 3 feet.

A—A.—Wet and cold weather level.

B—B.—Hot weather level.

C.—Blanket of sand and vegetable debris.

D—D.—Hot bed.

E—E.—Rim

F—F.—Excavation.

H.—Egg chamber.

Bird Notes. Re Robins at Stirling West.

BY J. W. MELLOR.

A fortnight after noting the young birds feeding, the three red spots on the breast of young had spread and met, forming a red breast almost as bright as the cock parent bird. A strange thing noted was that the hen parent bird did all the feeding of the young, and the cock bird was nowhere to be seen, but just at the time for the young to be "weaned" he appeared on the scene, and instead of assisting to feed, he administered severe chastisement upon the offspring, apparently with the object of letting them know that it was time for them to be about their own business, whereupon they fed themselves. They are now feeding themselves at the back door each day.

Noted the white-throated tree creeper feeding on the ground, and upon investigation found that it was eating numbers of the small common black ant.

March 30, 1917, saw at Lockleys the parent Minah feeding two fully fledged young that were flying.

March 29 saw parent bird of Brush Wattle Bird at Fulham feeding two young out of nest and fully fledged, able to fly.

March 28, saw numbers of Australian Swifts at Reedbeds. they only stayed for an hour or two and passed on. They were "hawking" after insects in mid-air in the usual way, and were the forerunners of the present stormy weather.

March 26, saw two yellow-eared black cockatoos at "Glenburne", Stirling West, passing over towards the east.

Note on the Little Black Cormorant (*Mesocarbo ater*—Lesson).

By F. R. ZIETZ, Ornithologist, S.A. Museum.

(Contribution from the S.A. Museum.)

In January, 1911, the Museum received from Mr. E. Ashby three nests and two nestlings of the Little Black Cormorant, which he obtained in a swamp about twenty miles above Manum, on the River Murray. They were taken out of a dead Eucalypt which contained thirty-two nests of the same species.

The two young birds which are nearly as large as an adult, have their wings and tail feathered, whilst the neck, body, and posterior third of the head, are covered with black down. The anterior two thirds of the head and the whole of the throat are naked, the clothed portion reaching a little beyond the ears. The naked skin of the crown is reddish brown, becoming lighter on the sides of the head, and yellowish on the throat. A black line extends from a little below the ear to the base of the bill, passing through the eye, a black spot is present on the lower mandible immediately below the eye.

The only naked skin on the head of the adult is a leaden grey patch surrounding the eye, and a similarly coloured area at the base of the lower mandible. Mathews states* "The immature bird differs from the adult in being more or less brown on the head, sides of face, foreneck and chest; and white-tipped plumes on the head much less numerous." Apparently his immature specimens were fully fledged, in which case the greater portion of the head and throat had already been covered with feathers.

This naked condition of the head and neck in the nestlings seems to be a provision by nature to avoid the soiling of the plumage when the young birds insert their bills into the gullet of their parents when being fed.

*Birds of Australia, by Gregory M. Mathews, Vol. IV, pt. 2, p. 175.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

BY HIS SON, S. A. WHITE, M.B.O.U.

XIII. THE ORNITHOLOGIST AND SAILOR.

Under the date of Monday, 28th of June, Samuel White wrote:—"I did not get as many birds as I expected, returned at noon to the yacht, and went out again this afternoon and procured a few more. Andrews went out with the gun, and after a short time in the scrub became quite exhausted. Among the birds taken to-day were some beautiful parrots. No Birds-of-Paradise yet, but a lot of plumes were offered to me to-day, and fifteen shillings a piece was refused. Notwithstanding I have been trying to persuade myself to the contrary I begin to be convinced that I have made a great mistake by not getting native gunners from Sydney or Thursday Island. My white men are too soft and unaccustomed to the climate to be of much use, and labour is not to be got here. The crew have been cutting wood and bringing it off all day to the vessel. The weather has been squally, and travelling through the scrub very uncomfortable, as we were wet to the skin all day; shall only stay here to-morrow, the country is too low."

Next morning at sunrise Samuel White and his taxidermist (Andrews) landed with guns, and returned at noon, Andrews only having four birds, while my father brought off ten specimens. Andrews was too distressed to land in the afternoon, but the owner of the vessel went off and brought back several more birds. His other taxidermist (J. Cockerell) remained on board owing to a bad foot, but he put the time in curing specimens. Some traders visited the ship during the day offering live parrots, also paradise plumes. In the evening the native teacher, who was a man from Amboina, came on board. My father writes:—"This native teacher is a very quiet and well-behaved man. He, unfortunately, cannot speak a word of English, but I am able to make myself understood with a few words in Dutch. I made him a few presents of coffee, tobacco, and a knife. I wished him to procure for me a man to show me the nearest village, where the natives captured the great birds of paradise; but after making enquiries, he said they would not come with me because they were afraid. I believe they were afraid we were going to interfere with their trade, as they do a good business in plumes.

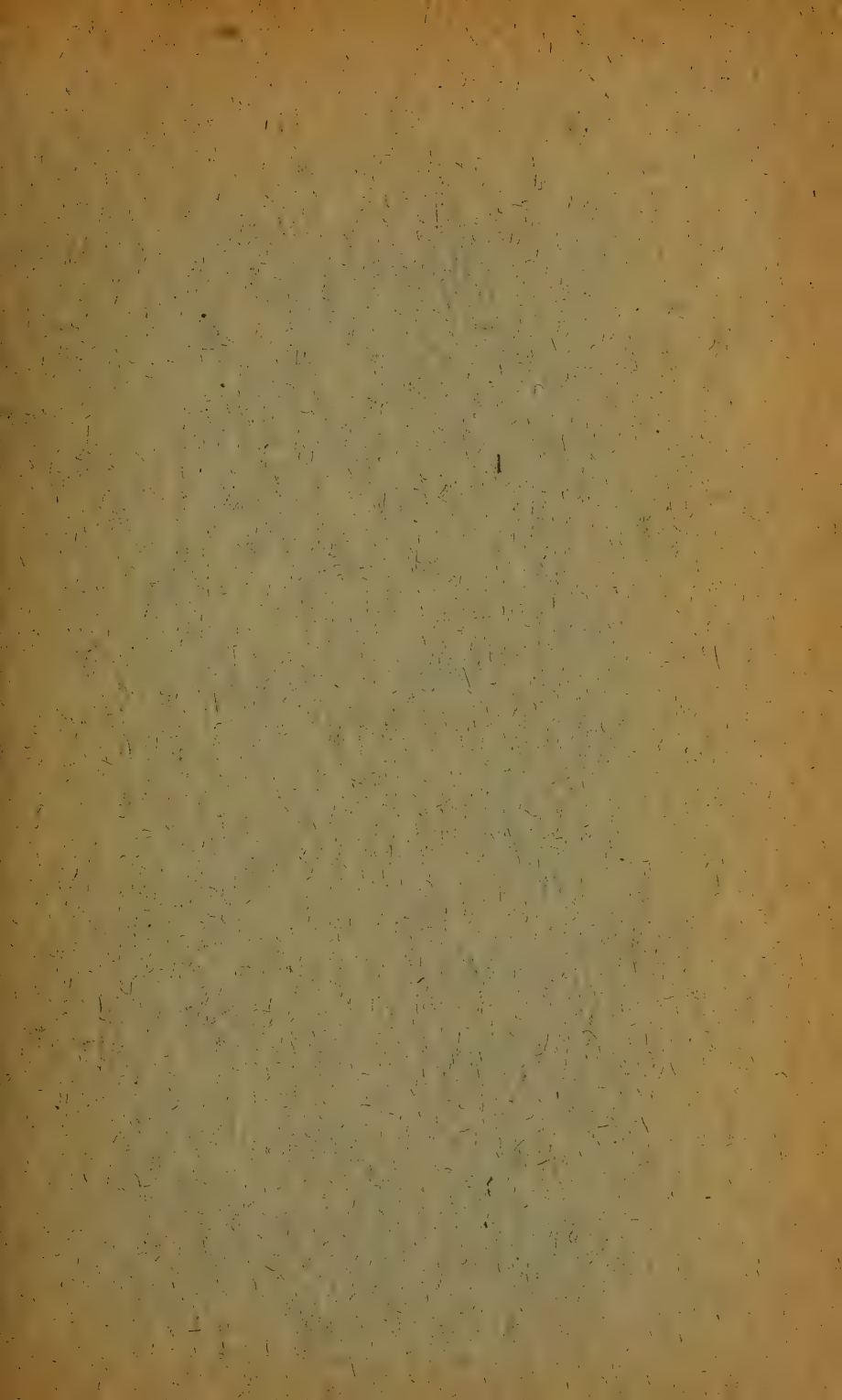
Soon after this some natives brought off plumes for sale, and through the teacher I was able to purchase fifteen plumes at a slight reduction on twenty shillings, but they would not deal for anything but money." Heavy showers passed over during the day, and those who went into the scrub were sopping wet, for all the trees and shrubs showered down water long after the rain ceased. On the morning of the 30th the yacht left the anchorage off the village of Maykor. Just as the vessel was getting under weigh a canoe came off with some cocoanuts and a *megapode* egg, the latter had a fledged young one in it. The natives were made a present of coffee and sugar. The wind died away, and very little headway was made; a current setting in, the anchor was dropped in six fathoms between Maykor and the small island off the North end. On July 1st the anchor was lifted, but the wind was very light, and at ten o'clock the yacht was about four miles off shore. Samuel White gave orders for a boat to be lowered, and he, with his two taxidermists were pulled on shore by two of the crew. They remained here until 3 p.m., while the vessel worked up. They then went on board, having obtained six birds, but this was not a good collecting ground. When the boat left the island, Andrews could not be found, so one of the crew with the dingy was sent off to look for him. At ten o'clock, nothing having been heard of Andrews or the man with the boat, an officer with a boat's crew was sent to search for the two men. The schooner continued on her way southwards, about five miles along the coast of Wokan, when a deep inlet or mouth of a creek was sighted, and here the vessel was brought up in nine fathoms. In the middle of the channel it was found there was fifteen fathoms of water, and a very strong tide running out. Samuel White in his notes says:—"This channel we have anchored in is, I believe, the Watelai Channel, and looks like the one in Wallace's chart, and not like that marked on either of the admiralty charts I have before me. Here I have dropped (by accident, whilst trying to make a village that was seen from the ship's decks), on the very place I wanted to reach. Up this channel is the village of Wanumbai—Wallace's old collecting ground. At dark a prau came alongside, and the crew pointed up stream and said Wanumbai, so I believe this is correct, although at Maykor I was directed round Dobbo to reach Wanumbai. Great numbers of fish were jumping out of the water all around the vessel, but would not take a bait. A small whale was also playing


around all the evening. The weather all the morning was hot and sultry; in the afternoon heavy clouds came up, and a steady rain set in all the evening." At seven o'clock next morning the man with the dingy turned up without having seen anything of Andrews, and several hours later the second boat's crew made their appearance with the report that they had not seen any trace of the missing man. At noon Samuel White left with a fresh crew in one of the ship's boats, and made along the coast to the north, and after a few hours' search, found Andrews in a hollow tree, where he had spent the night. He was taken on board, seemingly little the worse for his adventure. All Andrews could find to eat were some large green frogs, which he described as being of excellent flavour. During the afternoon Samuel White, with Cockerell, landed on the island of Maykor, but they had barely set foot on land when heavy rain fell, and continued till sunset, and they had to return to the craft without procuring anything. Under this date my father writes:—"Just before sunset, when the weather showed signs of clearing, I ordered a boat out and landed on the reef close by at low water, to look for shells, but there was nothing worth gathering. A canoe full of natives came off this evening with shells and a few birds, all of which I purchased to encourage them to collect. There are *Paradisea apoda* near here I know, for I heard them this morning. I rose before it was light, to sit on the deck and listen to the sounds and calls of birds, and among numerous voices I heard that of the great bird of paradise. Being otherwise occupied to-day, I shall endeavour to make their acquaintance to-morrow." The weather all the morning was fine and hot, but the afternoon was wet. Samuel White in his notes under July 3rd, says:—"This morning I took Cockerell and landed on the left bank of the Watelai Channel, or what is according to Wallace's chart, Wokan. We pushed our way several miles back, but the country was exceedingly rough and unproductive. The moment I landed I heard and saw several of the great birds of paradise, and in a few minutes shot one, but found it was a female, and of a chocolate brown colour all over, much darker on the head and chest. During the day I procured four, and saw several more, but they were all of the same colour. They are as large as a small crow. The old birds being like the rifle birds of Australia, very shy, and surrounded by perhaps fifty females and immature birds. We returned to the craft in the afternoon wet to the skin as usual." Before dark that evening,

Cockerell landed again, this time on the other side of the channel, but returned after dark without collecting anything, and reported that the scrub was almost impenetrable.


As soon as the natives sighted the "Ragah" (meaning my father) going on board, they would swarm off to the ship, and the decks of the latter would be soon covered with their dark forms, each one having some article to barter in the shape of living birds, reptiles, shells, insects, arrows, plumes, etc. They drive hard bargains, but nearly always want rupees. They are very persevering and patient, behaving in a most quiet and becoming manner. Always asking more than they take; time appears to be of little object to them, for if they cannot make a bargain to-day, they come again to-morrow and the next day. The traders in plumes were all Malays or Macassar men, and seemed to set a standard commercial value on them to which they descend, but no lower. If trade such as calico, tobacco, cutlery, be offered in barter, they will take it up quietly, turn it over twenty times, count it over and over, calculate the quality and commercial value to them, and if they can get no more and can see a profit, they take it up and walk away. Again turning to my father's notes about this time I find:—"Every day I have been here I have been trying to trade for fresh birds of paradise, but I now believe that none of the dealers catch the birds themselves, but barter for them with the Aru natives or 'Blackangtanna men' as they are called, which really means 'back country men.' They are therefore not able to get fresh birds. I have been offering a gun a piece for them, which is equal to £2 15/ a piece, but have not succeeded yet. I will go to Mr. Wallace's old collecting ground 'Wanumbai,' and try the natives there. Plumes are to be had in plenty indeed. I have been so pestered with traders to-day that I have had to put off much of my work till the evening, and then they will come off up to eleven p.m. offering plumes for sale as well as live parrots of various species, some of them most gorgeous in colour. To-day, for the first time, natives brought off *Cuscus*. One was a light straw coloured animal, the body beautifully spotted with black, and of a salmon pink about the face; the other was pale sandy brown, with a dark stripe down the back. These animals differ from the southern opossum, no less in the texture of the skin than in their colour, indeed, the skin seems to have no texture in it, for it is more like wet tissue paper than skin, which will not bear its own weight. If torn it is too thin to allow of sewing. The natives seem to be fond of

the flesh, and I always return the carcass to them, although purchased to encourage them to bring more." Although these natives wear ornaments they will not take beads unless they are red or white, these seemingly are the favourite colours. The weather was very unsettled at this time, rain fell every day in long and drenching showers, and the scrub showered down water on the party at every step all day long, keeping them in a constant bath. Fresh water was running everywhere and tumbling into the Watelai Channel on both sides. In some places at low tide fresh and good water was running into the channel several feet deep, and 150 yards below where the salt water had been in the morning. On the 4th some large parties of natives were off to the ship before sunrise, for they found that the "Ragah" was off collecting early in the day. Many things were traded for, and amongst others a large iguana, a rat, arrows, shells. Some praus came down the channel later on, on their way to Dobbo, and of course the crews might satisfy their curiosity by boarding the yacht. Writing upon this incident my father says:—"Some of these men who visited us to-day in their large praus had pearls for sale, some had plumes. I could not see anything in their boats they were taking to Dobbo for sale, and they did not appear to be traders as they could not speak a word of Malay, and had a good deal of the Papuan appearance about them. Several wanted to purchase tobacco with silver coins, and all appeared much surprised when I refused money. Some of my crew were on shore this afternoon, and when they returned they said they had seen a full plumaged bird of paradise not far from us. I can scarcely credit it." The weather was gloomy all day, and little rain fell.





W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.





J. H. Riley

Vol. III.

Part 4.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st OCTOBER, 1917.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., Ch.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd
Grenfell Street, Adelaide.

CONTENTS.

	PAGE
The South Australian Ornithological Association	93
Order Charadriformes, Family Vanellidae, Genus Zonifer	96
Birds on the River Murray. A. M. Morgan, M.B., Ch.B.	99
Birds of the North and North-West of Australia (No. 12). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	109
A Day in the Mallee. F. E. Parsons, R.A.O.U.	118
The Grey-faced Petrel. (<i>Pterodroma macroptera Smith</i>)—A New Record for the S.A. Coast. F. R. Zietz	116
Notes from Humbug Scrub. T. P. Bellechambers	117
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	117

— THE —

South Australian Ornithologist.

VOL. III.]

1ST OCTOBER, 1917.

[PART 4.]

The South Australian Ornithological Association.

JUNE 29th, 1917.

The monthly meeting of the South Australian Ornithological Association was held on Friday evening, June 29th, 1917, in the Royal Society's Rooms. Capt. S. A. White presided. Mr. Ashby reported that the swift parrot (*Lathamus discolor*), had been seen at Blackwood during the last week, and remarked upon the unusually quick return of these birds, for they appeared in numbers in 1914. The first record of this bird having been seen in South Australia is in 1862, and this again appeared in 1882. Mr. Ashby also stated that great numbers of wood swallows (*Pseudartamus cyanopterus*) had appeared on the ploughed ground at Blackwood, and that it was a very fine sight to see dozens of these birds in the furrows after the plough had passed along, hunting for grubs and insect life. Mr. Ashby further remarked upon the numbers of grass parrots (*Psephotus haematonotus*) in his district this year. Dr. A. M. Morgan reported the appearance of the fantailed cuckoo (*Cacomantis rubricatus*), and the narrow-billed cuckoo (*Neochalcites basalis mellori*), and stated that he had seen great numbers of wood swallows (*Pseudartamus cyanopterus*) swarming at dusk upon a *Grevillea robusta* tree growing in the park lands. This is a strange custom common to these birds. The swarming takes place at dusk, or on a dark cloudy day, when they hang to one another like bees. Mr. A. Crompton stated he had seen many Blue Mountain Parrots (*Trichoglossus novae-hollandiae*)

flying high, and always in the same direction. Mr. J. W. Mellor reported that the spiny-cheeked honey eater (*Acanthagenys rufogularis*), the pallid cuckoo (*Heteroscenes pallidus*), and the landrail (*Hypotaenidia philippensis*) were all seen at Lockleys lately. Capt. White reported having seen and heard the pallid cuckoo on June 12th, at the Reed Beds, the fan-tailed cuckoo for some time past, and the narrow-billed cuckoo quite recently, and the landrail on June 19th and 20th, the last mentioned bird not having been seen for several years past, also the white-shafted flycatcher (*Rhipidura flabellifera whitei*), the scarlet-breasted robin (*Petroica multicolor*). All these birds having been under observation during the last month. The Adelaide parrakeet (*Platycercus adelaidae*), one of two of which are often seen at the Reed Beds during the winter months. The flame-breasted robin had been migrating for some time. The Hon. Sec. (Mr. F. M. Angel), read a copy of Capt. White's report to the Advisory Committee for Science and Industry, upon his recent trip of investigation concerning sparrows, following the East-west Railway line. Mr. Frank Parsons exhibited a small collection of bird skins procured in the lower Murray River. Among them were the crested-bell bird (*Oreocica cristata*), red-capped babbler (*Pomatostomus ruficeps*), mallee parrot (*Barnardius barnardi*), bluebonnet (*Northiella haematogaster*), and Bennett's crow (*Corvus bennetti*). The following birds were discussed during the evening:—Caterpillar catcher (*Metagraucalus tenuirostris*), white-shouldered caterpillar eater (*Lalage tricolor*), pied caterpillar eater (*Karua leucomela*), spine-tailed logrunner (*Orthonyx maculatus*), black-headed logrunner (*Macrorhonyx spaldingi*), spotted ground bird (*Cinclosoma punctatum*), also the Tasmanian form, chestnut-backed ground bird (*C. castanotum*), and the chestnut-breasted ground bird (*C. castaneothorax*). Numerous specimens of these birds were exhibited from the museum collection by Mr. F. R. Zietz, and by Messrs. Ashby and Mellor and Capt. White from their private collections.

JULY 27th, 1917.

The monthly meeting of the South Australian Ornithological Association was held on Friday evening, July 27th, in the Royal Society Rooms. Mr. A. G. Edquist presided. Mr. Shields (late of Renmark and now at Mount Remarkable) was elected a member. Mr. Mellor reported that the white-backed magpie was busy nesting at Lockleys, and that the

pallid cuckoo had been calling loudly lately. The white-browed babblers (*Morganornis superciliosus*) had nested at the Reed Beds, and that large fully fledged young were about with the parent birds; he also reported the landrail. Mr. Edquist recorded the nesting of the silver-eye (*Zosterops lateralis westernensis*), and stated that the bird roosted in the nest every night during the time of construction. Dr. A. M. Morgan stated that he had found that the warty-faced honey eater had left the foot-hills, and gone further into the ranges. Mr. F. R. Zietz stated that two female plain wanderers (*Pedionomus torquatus*) had been handed into the museum during the last quail season. The same member added that the introduced English skylark was fairly numerous at Gilles Plains this winter. Capt. White stated that owing to the heavy rains, and prospects of a fine season, several birds which have been absent from the Adelaide plains for several years have again appeared. The pallid cuckoos have returned in numbers, and several landrails (*Hypotaenidia philippensis*) have been seen and heard. He also drew attention to the great good the white-browed babblers did in the orchards, they being always on the search for codlin larvae and insects. The birds under discussion for the evening were scrub robins (*Drymodes*), not sufficient specimens were forthcoming to decide upon the various sub-species. Ground wrens (*Hylacola*), a series of these birds was exhibited, and it was thought that the New South Wales and Victorian birds differ from those from South Australia. The coachwhip bird (*Psophodes*) was discussed, and there seemed to be a diversity of opinion if the male and the female shared in producing the wonderful swish and crack of the whip. Specimens were shown from the museum collection by the ornithologist (Mr. F. R. Zietz), and from the private collections of Mr. F. Parsons, Mr. Mellor, and Capt. White.

AUGUST 31st, 1917.

The monthly meeting of the South Australian Ornithological Association was held on Friday evening, August 31st, in the Royal Society's Rooms. Mr. A. G. Edquist presided. The Chairman read a letter from the Head Teacher, Prospect Hill Public School, saying how pleased and honoured the school was having won the silver cup presented by the Association for the best essay on a bird and tree. Capt. White referred to the many water birds which had revisited the Reed Beds this

year, and stated that it was a record for so many white cranes to have been seen together in the district. Mr. J. W. Mellor mentioned having seen the white crane and the ibis at Lockleys; he also reported the white-fronted heron having young in the same district, and communicated upon the tameness of all these birds. Mr. E. Ashby reported having seen the white crane, also a bittern at Blackwood. He also reported that the swift parrot was still about in the ranges. Mr. F. R. Zietz exhibited the skin of the grey-faced petrel, which is a record for South Australian waters, it having been recorded breeding off the Western Australian Coast. The bird had been evidently driven in by stress of weather, for it was captured on the beach near Brighton after the recent storms. Mr. Ashby showed a nest and eggs of the restless flycatcher, which had been taken this season. The discussions of the evening comprised the family of birds commonly known as babblers (*Pomatostomus*). The following birds came under notice:—Australian babbler (*P. temporalis*), from Queensland, N.S.W., Victoria, and South Australia; the chestnut-crowned babbler (*P. ruficeps*), white-browed babbler (*Morganornis superciliosus*). Specimens of the genus were shown from many parts of the State. Specimens of all the above species were shown by Mr. F. R. Zietz from the Museum collection, and by Messrs. E. Ashby, F. Parsons, J. W. Mellor, and Capt. White's private collections.

Order Charadriiformes, Family Vanellidae, Genus *Zonifer*.

Zonifer tricolor.—The Black-breasted Plover, sometimes called the Queen Plover to distinguish it from its larger relative the spur-winged plover, which in some parts is called the King Plover.

Description.—Upper Surface.—Upper part of the head, black; upper back, brown; middle and lower back, brown, tinged with dull purple; upper tail coverts, white.

Under Surface.—Throat, neck, and upper breast, white; lores and a line under the eye, black, bounded above by a narrow line of white broadening behind the eye, and extending to the sides of the occiput; breast, black extending up the sides of the neck to join the black line on the sides of the head; abdomen and under tail coverts, white.

Wing—Primaries, black; the bases of the inner webs, white; secondaries, the first seven or eight with the outer webs and tips, black; the inner webs white at the base, the white gradually increasing until the last four or five are entirely white; upper wing coverts, brown, tinged with dull purple, the lower ones tipped with white; under wing coverts, white.

Tail—White at the base, followed by a broad band of black, and tipped with white.

Legs and Feet—Dull dark red.

Bill—Yellow, tip brown.

Iris—Yellow.

Wattle at the base of the bill, bright red.

Measurements—Total length of skin, 26 c.m.; wing, 18 c.m.; tail, 9.50 c.m.; bill, 2 c.m.; tarsus, 5.10 c.m.

The female resembles the male.

Chick—"Covered with pale brown down on all the upper parts of the body, the base of the down black, giving it a mottled appearance; forehead and crown of head like the back; lores and down above the eye with a rufous wash; a crescent shaped marking on the nape, black; sides of the forehead, pale rufous; down below the eye, on the cheeks, and all the under surface pure white; ear coverts and a patch on each side of the forehead, blackish brown; long down on the outsides of the thighs and under tail coverts tinged with fulvous; tips of pin feathers of inner secondaries and scapulars, fulvous; bill, olive-brown, the under mandible paler; legs and feet, olive grey; iris, dull greenish yellow."—(North).

Distribution—The Black-breasted Plover is found in all the non-tropical parts of Australia, including Tasmania, Kangaroo Island, and most of the islands of the Bass' Straits. They are still fairly common on the Adelaide plains, and in some parts, where not disturbed, become very tame. Unlike the Spur-winged Plover it does not favour wet and swampy country, but is generally to be found in dry plains, often such as are grassless and stony. Dry lagoon beds and fallow fields are favourite localities. Its range extends far into the interior.

Habits—They go in flocks from six or seven up to forty or fifty in number. As a rule they are very wary and difficult to approach on foot, especially in districts where they have been much disturbed, but can usually be easily stalked in a buggy or on horseback. When their backs are turned, to the observer, they harmonise wonderfully well with their

surroundings, and are distinguished with difficulty; on the other hand the white breast and black band are very conspicuous when seen face to face. If one of the flock be wounded the rest come to his rescue, circling and screaming round the intruder, and making bold dashes at him. They are not regular migrants, but wander from place to place as food or other consideration impel them. These flights are usually high in the air, and often take place at night; at such times they are only distinguished by their call.

Flight—Rapid and straight, with rather slow powerful wing beats. Occasionally the flight is zig zag, almost like that of a snipe. This kind of flight is most often seen in windy weather, and seems to be in play.

Song—A succession of loud harsh notes like kak-kak-kak—kak kak uttered when in flight, rarely uttered on the ground.

Food—Chiefly insects, such as grasshoppers, beetles, and caterpillars, occasionally worms; if insect life be scarce seeds are taken.

Nest—A few short pieces of grass in a depression of the ground. Sometimes the eggs are laid on the bare ground. When breeding the old birds become very cunning and brave, and are most energetic in trying to take one away from the young or eggs. When not too near the nest they will dart down on the intruder, often within a few inches of his face, making one believe he is near the nest, when as a matter of fact he is some distance off. The chicks when disturbed immediately scatter and squat, and become almost invisible, so that if a clutch of four be seen it is usually only the one upon which the eyes have been kept fixed that is caught. They are early breeders, eggs being commonly found in June, but in an early season they breed in May, or as soon as the green grass appears.

Eggs—Four in number, occasionally only three, of the usual ploverine pointed shape. They are placed in the nest with the pointed ends inwards.

Eggs—Ground colour, brown with a tinge of green, thickly and evenly covered with irregularly shaped spots and blotches, varying in colour from medium brown to almost black. Average measurement of 17 eggs, 4.28 x 3.20 c.m.

Largest egg, 4.60 x 3.25 c.m.

Smallest egg, 4.05 x 3.10 c.m.

Birds on the River Murray.

By A. M. Morgan, M.B., Ch. B.

This trip was not undertaken, in the first place, for ornithological purposes, but as a considerable amount of bird observation and a little collecting was done, I think the results are worth recording.

My wife and I left Morgan on March 31st, at 6 p.m., in the Gem Company's river boat "Ruby", calling at Cobdogla, Moorook, Pyap, and Loxton on April 1st, and reaching Renmark on the morning of April 2nd. That day was the most interesting of the trip, for the river between Renmark and the border is but little settled, and water fowl were numerous. April 3rd was spent between the border and Wentworth, and April 4th at Mildura. From Mildura we returned to Renmark by the boat reaching that town early on Good Friday morning. A week was spent at Renmark at the excellent hotel. Our days being occupied in exploring the surrounding country under the guidance of Mr. Herbert Shields, who kindly gave up much of his time in assisting us. Renmark was left on April 7th by motor for the four and a half hours' run to Morgan through the mallee scrub. I may say that we found the river boat very comfortable, with good food, and a most obliging staff. It is also very gratifying to be able to state that shooting from the Gem Co. boats has been absolutely stopped. Formerly much useless slaughter took place from these boats, both protected and unprotected birds, none of which were, of course, recovered. I am sorry to say not a single emu was seen upon the trip. He heard that they are becoming very scarce near the river frontage, though a few are still to be found further back. The mallee hen we also heard spoken of as rare, though formerly the mallee scrub of this district was one of their strongholds, we saw nothing of it.

As most of the birds observed were identified with the field glasses, the subspecific name is given only when it had been previously ascertained, or when a specimen was obtained. Even then it is usually not possible to identify the sub species from Mr. Mathews' meagre descriptions. 96 species in all were identified.

Birds observed:—

Geopelia placida tranquilla (The Peaceful Dove)—Common near the river banks throughout the trip.

Ocyphaps lophotes (Crested Bronzewing).—Common in the mallee scrub about Renmark. Only seen once on the river bank. A number of them was seen near Paringa about a heap of "cocky chaff."

Phaps chalcoptera (Bronzewing Pigeon).—A single bird seen on the river bank near Renmark.

Gallinula tenebrosa (Moorhen).—Only two birds seen throughout the journey. Each was swimming in the river, and ran up the bank on the approach of the steamer.

Fulica atra tasmanica (Coot).—Seen, in pairs or small flocks, throughout the trip. Nowhere numerous.

The bald coot *Porphyrio melanotus* was not seen at all, although there was no lack of situation suitable for it.

Lobibyx novae-hollandiae (Spur-winged Plover).—Seen in pairs throughout the trip; generally on sandspits jutting out into the stream. Not numerous.

Zonifer tricolor (Black-breasted Plover).—One large flock seen on a dry bare flat near Renmark.

Elseya melanops (Black-fronted Dotterel).—Seen in pairs throughout the trip, on the river bank and the edges of swamps.

Burhinus magnirostris (Scrub Curlew or Stone Plover).—Frequently heard at night. One pair seen on a gum flat near Renmark.

Carphibis spinicollis (Straw-necked Ibis).—Common about Renmark, and from there to Wentworth; not seen lower down the river. The white Ibis was not seen.

Platibis flavipes (Yellow-billed Spoonbill).—Seen occasionally from Renmark upwards. At a place on the Victorian part of the river, where there is a large heronry, these birds were seen in numbers flying over the tree tops. Dr. Chenery, of Wentworth, who visited this heronry early in March, found nankeen night herons, white necked herons, egrets, and spoonbills nesting in numbers in the tall gums. All the birds except the nankeen herons, which were still sitting, had large young. From the steamer only a few nests were visible, but nankeen herons, white-necked herons and spoonbills were flying over the tops of the trees in great numbers, and hundreds of young nankeens were roosting in the trees near the water. We did not see any white egrets. They had probably all left, as a month earlier Dr. Chenery found full grown young ones. Over this heronry about forty whistling eagles were constantly soaring, probably on the lookout for dead young birds or dropped fish.

Herodias alba symmatophora (The White Egret).—Not common. A single bird was seen near the mouth of the Ana-branch, and a flock of about a dozen near Rufus Creek, the entrance to Lake Victoria.

Notophox nova-hollandiae (White-fronted Heron or Blue Crane).—Very common. There was no time throughout the trip that a dozen or more were not in view.

Myola pacifica (White-necked Heron).—A few birds seen below Renmark, but from there to Wentworth they were very common.

Nycticorax caledonicus australasiae (The Nankeen Night Heron).—Common from Renmark upwards. About a dozen of these birds breed on Goat Island, near Renmark. The nests were unoccupied at the time of our visit, but Mr. Shields, who formally owned the island has seen them in use.

Chenopsis atrata (The Black Swan).—Seen occasionally throughout the trip. A pair was seen near Lake Victoria Station with young unable to fly.

Chenonetta jubata (Wood Duck or Maned Goose).—Uncommon below Renmark. Above that place they become very plentiful. Flocks of fifty or sixty were constantly rising before the boat. A pair was seen with young in the down.

Anas superciliosus (Black Duck).—Fairly plentiful throughout the trip, but much more common above than below Renmark. Several pairs were seen with young unable to fly.

Virago gibberifrons (Grey Teal).—Common throughout the trip, but as with the other waterfowl, much more numerous above than below Renmark. Young birds unable to fly were seen.

Nyroca australis (White-eyed Duck).—Only seen twice. Once a flock of about a dozen, and once a pair—on both occasions within a few miles of Renmark. The flock dived to avoid the steamer instead of rising from the water.

Biziura lobata (Musk Duck).—Solitary birds seen occasionally throughout the trip.

Phalacrocorax carbo novae-hollandiae (Large Black Cormorant).—Solitary birds seen occasionally throughout the trip. On one occasion near Renmark four were seen flying with a flock of little black cormorants.

Mesocarbo ater (Little Black Cormorant).—Common on all parts of the river bank, generally in flocks of about a dozen.

Hypoleucus varius hypoleucus (Orange-faced Cormorant).—three solitary birds seen.

Microcarbo melanoleucus (Little Pied Cormorant).—Common throughout the trip, in flocks up to about twenty.

Anhinga novae-hollandiae (Darter).—A single bird seen fishing in the river.

Catoptropelicanus conspicillatus (Pelican).—Seen in numbers between Renmark and Wentworth.

Uroaetus audax (Wedge-tailed Eagle).—Only two birds seen.

Haliastur spheonurus (Whistling Eagle).—Very common. Seen in pairs throughout the trip, and once in a flock circling over a heronry. Many nests were seen in the tall gums of the river bank.

Ieracidea berigora (Striped Brown Hawk).—Only one bird seen near Paringa.

Cerchneis cenchroides (Kestrel).—Common both on the river banks and on the borders of the mallee near Renmark.

Spiloglaux boobook (Boobook Owl).—Heard at night near Wentworth. Mr. Shields has also heard them at Goat Island.

Cacatoes galerita (Sulphur Crested Cockatoo).—Very common throughout the trip.

Eolophus roseicapillus (Galah).—Common from Renmark to Wentworth. Near Paringa a flock was seen about a heap of "cocky chaff."

Polytelis anthoepus (Rock Pebbler or Black-tailed Parrot).—First seen at Loxton where a flock of about twenty flew along the bank. From there to Wentworth they were frequently seen, but always in pairs. A pair was shot at Ral Ral creek, near Renmark. The measurement of this pair were:—

♂. Total length, 40.5 c.m.; spread, 52 c.m.; wing, 18.5 c.m.; bill (culmen) 2 c.m.; tarsus, 1.80 c.m.

♀. Total length, 38 c.m.; spread, 53.5 c.m.; wing, 18.5 c.m.; bill, 2 c.m.; tarsus, 1.90 c.m.

Stomach contents:—Triturated vegetable matter. Crop contents:—Small shelled seeds. Irides, dark brown, with orange outer ring; bill, bright rose red, tips brown; feet, black, mottled with grey; inside mouth, light yellow.

Platyercus flarcolus (Yellow Parrot).—Common near the river banks throughout the trip. These birds are locally known as "smokers."

Barnardius barnardi (Mallee Parrot).—Common on the river banks, gum, and box flats, and also in the mallee. They have a bad name at Renmark as almond eaters.

Psephotus haematonotus (Red Rumped Parrot).—Common in the big gums of the river bank throughout the trip. They do not go far back from the river.

Psephotus varius (Many-coloured Parrot).—Seen only in the big mallee near Paringa. Not common.

Aegotheles cristata (Owlet Nightjar).—A single bird was flushed from a hollow stump in the mallee near Paringa and was shot.

Measurements:—Spread, 35.5 c.m.; wing, 11.25 c.m.; bill (culmen), 0.80 c.m.; tarsus, 1.80 c.m. Total length, 20.5 c.m. Sex, ♀. Iris, dark brown; feet, pale grey; inside of mouth, flesh colour. The stomach contained the remains of a beetle. This bird was moulting.

Dacelo gigas (Laughing Jackass).—Very common in the gums of the river bank. It does not leave the big timbered country.

Sauroptatis sancta (Sacred Kingfisher).—Seen once at Renmark and once crossing the river near Ned's Corner.

Neochalcites basalis mellori (Narrow-billed Bronze Cuckoo).—A single bird seen on a box gum flat near Renmark.

Hirundo neoxena (Welcome Swallow).—Common throughout the trip. A pair or two were always to be seen skimming the river in front of the steamer.

Cheramoeca leucosternum (White-breasted Swallow).—A few birds seen on the telegraph wires between Renmark and Morgan on the overland journey. Mr. Shields informed us that they bred in the banks of the river at Goat Island.

Hylochelidon nigricans (Tree Swallow).—Only seen twice—once in the big gums of a bend, near Ned's Corner and once on the overland journey to Morgan. They were never seen skimming the water like the welcome swallow.

Lagenoplastes ariel (Bottle Swallow).—Every cliff, throughout the journey, had groups of the nests of these birds upon it, but no birds were seen.

Microeca fascians (Brown Flycatcher).—Common both in the big timbered river flats and in the mallee.

Whitornis goodenovi (Red-capped Robin).—Common on the box flats and in the mallee. It does not come into the big gum country.

Melanodryas cucullata vigorsi (Hooded Robin).—Seen twice near Renmark on a box flat, and a dry polygonum swamp.

Smicrorhis brevirostris viridescens (Short-billed Tree Tit).—Very Common in all classes of country. Two nests were

found, one on April 6th, with young birds, and one on April 7th, ready for eggs. Both near Renmark.

Lewinornis ruficentris inornatus (Red-breasted Thickhead).—Common on the box gum and tea-tree flats, and in the big mallee country. This bird proved to be the southern form, not the pale bird of the northern dry country. A specimen collected measured—total length, 16 c.m.; tarsus, 1.70 c.m.; sex, ♂. Iris, bright reddish brown; bill, black; feet, greyish black; inside of mouth, black. The stomach contained the remains of spiders, grasshoppers, and caterpillars.

Gilbertornis rufogularis gilberti (Red-throated Thickhead).—A large thickhead has several times been seen and heard in the big mallee near Paringa, but no specimen could be secured, so the subspecies could not be determined.

Leucocirca tricolor (Wagtail).—Common throughout the trip in all classes of-country.

Seisura inquieta (Restless Flycatcher).—Common throughout the trip near the river banks, not seen in the mallee.

Coracina novae-hollandiae melanops (Black-faced Cuckoo-Shrike).—Seen occasionally near the river banks throughout the trip. Not seen in the mallee.

Cinclosoma sp. (Ground Thrush).—A bird of this genus ran across the track in front of the motor car near Paringa. It was probably *C. castanotum*, but as the specimen was not secured, I cannot be certain.

Morganornis superciliosus (White-browed Babbler).—Seen occasionally in the mallee and on the box flats, not at all common. A bird shot for identification proved to be a male in breeding condition. Measurements:—Total length, 20 c.m.; spread, 23.5 c.m.; bill, 2.5 c.m.; wing, 7 c.m.; tarsus, 2.6 c.m. The stomach contained remains of insects and a few small black seeds. Iris, reddish brown; bill—upper mandible, black; lower, light horn colour at the base, black at the tip; inside of beak, black; palate, horn colour; feet, blackish grey.

Ephthianura albifrons (White-faced Tin Tac).—Seen occasionally on the salt bush and box flats near Renmark.

Conopoderas australis (Reed Warbler).—Only seen once in some bull rushes beside a creek at Renmark. They may have been more common, but as they were not singing they would be difficult to locate.

Poodytes gramineus (Little Grass Bird).—Heard in the same situation as the last bird. They were not actually seen.

Acanthiza uropygialis (Chestnut-rumped Tit).—Very common in the dry country away from the river at Renmark. Two specimens were shot. The first was too mangled to skin or sex. Its iris was white, bill black, under jaw lighter, feet, black; inside of mouth black. The second was a male. Total length, 8.80 c.m.; spread, 16.50 c.m.; wing, 4.7 c.m.; bill, broken; tarsus, 1.60 c.m. The stomach contained remains of insects.

Geobasileus chrysorrhous (Tomtit).—Seen at Mildura and Renmark in the settlement, also at Renmark on the box flats.

Pyrholaemus brunneus (Redthroat).—Common on the salt bush and samphire flats near Renmark. Their song at this season is not so full and melodious as it is in the breeding season. A specimen measured:—Total length, 12 c.m.; spread, 17 c.m.; wing, 5.3 c.m.; bill, 1 c.m.; tarsus, 1.9 c.m.. Sex, ♀; Iris, reddish brown, with lighter outer rim; feet, dark grey brown; bill, brown; under jaw, lighter; inside of mouth, blackish grey. The stomach contained remains of insects.

Hallornis cyanotis (White-winged Wren).—Two families were seen on a samphire flat near Renmark; they were very shy, and were not singing.

Leggeornis lamberti assimilis (Purple-backed Wren).—These birds were fairly plentiful in the large salt bush ground, amongst the box gums, and also in the dry polygonum swamps, but they were very shy, and quite silent, so that it was only with difficulty that a specimen was secured. Measurements:—Total length, 12 c.m.; spread, 12 c.m.; wing, 3.50 c.m.; bill, .80 c.m.; tarsus, 2.10 c.m. Sex, ♂. Iris, black; bill, black; legs and feet, brown. The stomach contained ants and insect eggs.

Artamus leucorhynchus leucopygialis (White-rumped Wood Swallow).—First seen near Loxton in the large gums of the river side, from thence to Mildura they were seen occasionally in similar situations. They do not seem to leave the river bank, and are mostly in pairs or groups of four or five. An adult and a young bird were shot on Goat Island. The adult measured:—Total length, 17.5 c.m.; spread, 35 c.m.; wing, 10 c.m.; bill, 1.5 c.m.; tarsus, 1.3 c.m. Sex, ♂. Iris, very dark brown; bill, light blue; tip, black; feet, mealy grey; inside of mouth, black. Stomach contents, flying ants, identified by Mr. A. M. Lea as of the genus *Iridomyrmex*. The young bird measured:—Total length, 17 c.m.; spread, 33.5 c.m.; bill, 1.40 c.m.; tarsus, 1.40 c.m. Sex, ♀. Stomach con-

tents, flying ants and a grasshopper. Bill, brown; other parts as in adult.

Campbellornis personatus (Masked Wood-swallow).—Seen on two occasions near Renmark flying overhead; not seen to settle.

Campbellornis superciliosus (White-browed Wood Swallow).—Seen on two occasions flying overhead in company with the former bird.

Pseudartamus cyanopterus (Wood Swallow).—Seen at intervals throughout the trip, near the river banks. Not seen in the mallee.

Colluricincla harmonica (Grey Shrike Thrush).—Seen and heard at intervals throughout the trip.

Grallina cyanoleuca (Magpie Lark or Murray Magpie).—One of the commonest birds on the river. There were always several in sight throughout the trip.

Gymnorhina tibicen (Black-backed Magpie).—This bird was first seen near the Ana Branch Station, in N.S.W., but on our return to Renmark we found that it was common in that district in the big mallee and box flats. Magpies of any kind are uncommon in the big timber near the river. On the overland trip to Morgan this species was the only one seen till about 10 miles east of Morgan, where both species were seen. From that point to Adelaide only the white-backed were seen. The black back species probably extends from near Morgan to near Wentworth, where Dr. Chenery tells me the magpies are all white backs, he only having seen one black back since he has been there.

Gymnorhina hypoleuca leuconota (White-backed Magpie).—Only seen near Morgan.

Cracticus nigrogularis (Black-throated Butcher Bird).—Seen and heard at intervals from Renmark to Mildura, near the river bank.

Bulestes torquatus (Butcher Bird).—Common from Morgan to Mildura, both near the river and in the mallee.

Orcoica cristata (Crested Bell Bird).—Heard several times in the mallee near Renmark. Not common.

Aphelocephala leucopsis (White face).—Fairly common in the mallee and salt bush flats near Renmark, but in nothing like the numbers in which one sees them in the dry northern country. A bird shot measured:—Total length, 10 c.m.; spread, 17 c.m.; wing, 5.9 c.m.; bill, .80 c.m.; tarsus, 1.6 c.m. Sex, ♂. Iris, white; bill, black; feet, black; inside of mouth, black. The stomach contained the remains of insects.

Climacteris erythrops superciliosa (White-browed Tree Creeper).—Fairly common in the mallee near Renmark. A bird shot measured:—Total length, 14.5 c.m.; spread, 25.5 c.m.; bill, 1.3 c.m.; wing, 8.1 c.m.; tarsus, 2 c.m. Sex, ♂. Iris, dark brown; legs and feet, black; inside of mouth, greyish black. Stomach contents, insect remains. The specimen is somewhat darker in general coloration than birds from the north-west of Port Augusta.

Neocichmia picumna (Brown Tree Creeper).—Fairly common in the big timber near the river.

Pardalotus punctatus xanthopygius (Yellow-rumped Diamond Bird).—Fairly common near Renmark, both in the big timber and the mallee. A specimen measured:—Total length, 8.80 c.m.; spread, 16.50 c.m.; wing, 4.7 c.m.; bill broken; tarsus, 1.60 c.m. Sex, ♂. Iris, brown; feet, brown; inside of mouth, flesh colour. Stomach contents, insect remains.

Pardalotus striatus subaffinis (Striped Diamond Bird).—Common throughout the trip in big gums and mallee. A specimen measured:—Total length, 10 c.m.; spread, 19 c.m.; bill, .60 c.m.; wing, 5 c.m.; tarsus, 1.60 c.m. Sex, ♂. Iris, greyish black; bill, black; base of lower jaw, light horn colour; inside of mouth, white; feet, blackish grey. Stomach contents, insect remains and a large green caterpillar.

Melithreptus atricapillus mallee (Brown-headed Honey Eater).—Seen occasionally near Renmark on the box flats, and in the mallee. Two specimens were shot. The first measured:—Total length, 13 c.m.; spread, 18 c.m.; wing, 6 c.m.; bill, 1.20 c.m.; tarsus, 1.50 c.m. Sex, ♂. Iris, dark brown; bill, black; legs and feet, brown; inside of mouth, yellow. Stomach contents, insect remains. The second measured:—Total length, 12 c.m.; spread, 16 c.m.; wing, 6.10 c.m.; bill, 1 c.m.; tarsus, 1.40 c.m. Sex, ♀. Iris, brown; bill, black; bare skin around eye, dull yellow; feet, brown. Stomach contents, insect remains and a small green caterpillar.

Plectorhyncha lanceolata (Striped Honey Eater).—A small flock seen feeding in the large red gums on Goat Island. One specimen shot measured:—Total length, 21 c.m.; spread, 31.5 c.m.; wing, 9 c.m.; bill, 1.60 c.m.; tarsus, 2.20 c.m. Sex, ♂. Iris, dark brown; bill, upper jaw, dark horn, lower jaw, light horn at the base, tip darker; feet, blue grey; inside of mouth, light horn colour. Stomach contents, beetles and some triturated vegetable matter.

Gliciphila albifrons (White-fronted Honey Eater).—Seen at Paringa in the big mallee, and at Ned's Corner on a box flat. Two specimens were shot, both young birds. The first measured:—Total length, 15 c.m.; spread, 21 c.m.; bill, 1.30 c.m.; wing, 7 c.m.; tarsus, 1.70 c.m. Sex, ♂. Iris, dark brown; bill, black; feet, blackish grey; inside of mouth, yellow; bare spot at outer angle of eye, dull red. Stomach contents, remains of insects. The second measured:—Total length, 15.75 c.m.; spread, 20 c.m.; bill, 1.50 c.m.; wing, 7.1 c.m.; tarsus, 1.90 c.m. Sex, ♂. Soft parts as in the first. Stomach contents, insect remains.

Meliphaga sonora (Singing Honey Eater).—Seen and heard once near Renmark.

Lichenostomus ornatus tailemi (Yellow-plumed Honey Eater).—Seen in a patch of big mallee near Paringa, where they were fairly numerous. A specimen measured:—Total length, 16 c.m.; spread, 22.5 c.m.; bill, 1 c.m.; wing, 6.70 c.m.; tarsus, 1.70 c.m. Sex, ♂. Iris, dark brown; bill, black; legs and feet, greyish brown; inside of mouth, yellow. Stomach contents, remains of insects. The sub species is diagnosed from locality only.

Ptilotula penicillata (White-plumed Honey Eater, or Greeny).—Very common in the big gums near the river throughout the trip. Not seen in the mallee.

Myzantha melanocephala (Noisy Minah).—Very common on the river banks throughout the trip; they do not leave the big gums.

Myzantha flavigula (Yellow-throated Minah).—Common in the big mallee back from the river. They never come into the big timbered country near the river, not, I think, because they do not want to, but because the noisy minahs will not let them, because at Laura, where the present bird was the only species of the genus, they were more common in the big gums than in the dry scrub. The bird seen was not *m. f. melanotis* which was collected by Capt. White at Turner's Well near Bow Hill. The latter bird is in my opinion a good species, for it resembles *m. melanocephala* as much as if not more than *m. fl. flavigula*.

Acanthogenys ruficularis (Spiny-cheeked Honey Eater).—Very common in all classes of country throughout trip.

Entomyza cyanotis (Blue-faced Honey Eater).—A single pair seen feeding in a gum tree on the river bank.

Microphilemon orientalis (Yellow-throated Friar Bird).—Very numerous on Goat Island. Two specimens were shot.

Both young birds with marked yellow throats. The first measured:—Total length, 27 c.m.; spread, 36.5 c.m.; wing, 12 c.m.; tarsus, 2.5 c.m.; bill, 2.5 c.m.; sex, ?. Iris, dark grey; bill, black; legs and feet, lead colour; inside of mouth, yellow; bare space of face, black. Stomach contents, small beetles. The second measured:—Total length, 27.5 c.m.; spread, 41.25 c.m. Sex, ♂. Inside of mouth, flesh colour; other parts coloured as in the first bird. Stomach contents, yellow and black wasps.

Anthus australis (Ground Lark).—Seen on the cleared land near Paringa, and on a box flat near Renmark. Not common.

Taeniopygia castanotis (Chestnut-eared Finch).—Common in and about the settlement at Renmark.

Corvus coronoides (Raven).—Seen occasionally throughout the trip. They were common between Renmark and Morgan on the overland journey.

Corcorax melanorhamphus (Chough or Jay).—Seen occasionally near the river throughout the trip; also in the big mallee and box gum flats near Renmark. They were especially numerous on the overland journey to Morgan. They were always in flocks of about a dozen or twenty.

INTRODUCED BIRDS.

Sparrows and starlings were fairly plentiful at Renmark, but we were told by the fruit growers that they did very little damage.

We saw only two goldfinches, and Mr. Shields informed us that they were the first he had seen there.

Birds of the North and North-West of Australia.

From Notes and Skins made by the late Capt. T. H.
Bowyer-Bower.

BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., etc.
No. 12

156. *CACOMANTIS PYRROPHANUS DUMETORUM*. Western Square-tailed Cuckoo.

Cuculus dumetorum (Gould), Proc. Zool. Soc. (Lond.), 1845, p. 19. Port Essington, Northern Territory.

No. 308—♀. Length, 8.5 inches (12/9/86).

Irides, brown round the pupil, and gradually shading into olive grey on its outer circle; upper mandible, black, lower, olive-brown; front of tarsi and feet brownish ochre; back of tarsi and soles of feet, dirty yellow; inside of bill and mouth, bright salmon colour, deepest on the latter.

No. 348—♂. Length, 9.0 inches (19/9/86).

No. 445—♂. Length, 8.9 inches (26/10/86).

No. 527—♂. Length, 9.0 inches (8/11/86).

156. *OWENAVIS OSCULANS ROGERSI.* Western Black-eared Cuckoo.

Owenavis osculans rogersi (Mathews), Austral. Av. Rec., Irides, brown, bill and feet, black.

Vol. I., p. 13, 1912. Parry's Creek, North-west Australia.

No. 218—♀. Length, 7.85 inches (5/7/86).

No. 358—♀. Length, 8.1 inches (2/8/86).

No. 359—♂. Length, 7.8 inches (2/8/86).

No. 411—♀. Length, 8.1 inches (18/10/86).

These birds were observed in a thick tea-tree scrub.

157. *NEOCHALCITES BASALIS WYNDHAMI.* Western Narrow-billed Bronze Cuckoo.

Chrysococcyx basalis wyndhami (Mathews), Austral. Av. Rec., Vol. I., p. 14, 1912. Point Torment, North-west Australia.

No. 118—Length, 6.8 inches (12/6/86).

Irides, brownish grey; bill, black, bluish at the base of the lower mandible; feet mealy black.

160. *POLOPHILUS PHASIANINUS MELANURUS.* North-western Coucal.

Centropus melanurus (Gould), Birds, Austral., Vol. IV., text to pl. 92, 1847. Derby, North-west Australia.

No. 202—♀. Length, 2 feet, 3 inches (28/6/86).

No. 214—♀. (1/7/86).

Irides, light greenish brown; space around the eye, bluish lead colour; bill, fleshy white; legs and feet, lead colour.

No. 220—♂. Length, 25.7 (26/8/86).

165. *HYLOCHELIDON NIGRICANS NEGLECTA.* Western Tree Martin.

Petrochelidon nigricans neglecta (Mathews), Nov. Zool., Vol. XVIII., p. 301, 1912. Fitzroy River, North-west Australia.

No. 297—♂. Length, 4.8 inches.

No. 298.—Length, 4.7 inches (21/7/86).

Bill and legs, black. Very common, occasionally rests on dead trees in considerable numbers, chiefly in the early morning.

166. *MICROECA FASCINANS SUBPALLIDA*. Western Pale Fly-catcher.

Microeca fascinans subpallida (Mathews), Nov. Zool., Vol. XVIII., p. 302, 1912. Napier Broome Bay, North-west Australia.

No. 54—♀. Length, 5.2 inches (27/5/86).

Irides, dark brown; bill, brown; legs, black.

No. 83—♀. Length, 5.1 inches (2/6/86).

No. 84—♂. Length, 5.1 inches (2/6/86).

Irides, dark brown; bill, black, whitish at the base of the lower mandible; feet black.

170. *MELANODRYAS CUCULLATA PICATA*. Pied Robin.

Melanodryas picata (Gould), Handb. Birds Austral., Vol. I., p. 285, 1865. North-west Coast, Australia.

No. 487—♂. Length, 6.5 inches.

No. 492—♀. Length, 5.7 (2/11/86).

Irides, dark brown; bill, legs, and feet, black.

No. 499—♂. Length, 6.4 inches (3/11/06).

No. 502—♂. Length, 6.4 inches (3/11/06).

Irides, brown; bill, legs and feet, black.

No. 518—♀. Length, 6.2 inches (5/11/86).

171. *SMICRORNIS BREVIROSTRIS ROGERSI*. North-western Tree Tit.

Smicrornis brevirostris rogersi (Mathews), Nov. Zool., Vol. XVIII., p. 307, 1912. Napier Broome Bay, North-west Australia.

No. 191—♂. Length, 3.2 (27/6/06).

No. 193—♀. Length, 3.2 (27/6/06).

No. 209—♀. Length, 3.5 (29/6/06).

No. 291—♂. Length, 3.4 (19/7/86).

No. 352—Length, 3.2 (2/8/86).

No. 353—Length, 3.4 (2/8/86).

No. 368—Length, 3.7 (26/9/86).

172. *GERYGONE OLIVACEA ROGERSI*. Grey Fly-eater.

Gerygone albigularis rogersi (Mathews), Nov. Zool., Vol. XVIII., p. 23, 1911. Derby, North-west Australia.

No. 95—♂. Length 4 inches (5/6/86).

Bill, brown, fleshy white at the base of the lower mandible; legs, bluish-grey.

No. 113—♂. Length, 4.1 inches (8/6/86).

Irides, light red; bill, dark brown; feet, dark grey.

No. 115—♀. Length, 4 inches (8/6/86).

Bill, dark brown, lighter at the base of the lower mandible.

No. 275—♂. Length, 4 inches (5/9/86).

176. POECILODRYAS SUPERCILIOSA BELCHERI. Western Buff-sided Robin.

Pachycephala superciliosa belcheri (Mathews), Austral. Av. Rec. Vol. I., p. 40, 1912. Napier Broome Bay, North-west Australia.

No. 221—♂. Length, 6.1 inches (27/8/86).

No. 267—♂. Length, 6.1 inches (3/9/86).

No. 305—♂. (11/9/06).

No. 330—Length, 6.9 (16/9/86).

No. 332—Length 7 inches (16/9/86).

Irides, brown; feet and legs, brown.

No. 337—♀. Length, 6.4 inches (17/9/86).

Irides, greyish brown; bill, black; feet and legs, brown.

No. 465—imm. Length, 4.7 inches (28/10/86).

Irides, pale slaty brown; the pupil with a bluish and dull tint; eyelid, brown; somewhat lighter than the feathers of the head; bill, brown; the cutting edges and gape yellowish white; legs and feet light brown, with a purplish tint on the tarsus; claws, white.

No. 467—♂. Length, 6.8 (28/10/86).

No. 468—♀. Length, 6.5 (28/10/86).

Irides, brown; bill, feet, and legs, black.

The song of this bird is most beautiful and varied. In itself also it is a lovely bird when alive. The skins give no idea of its real beauty, when seen sitting under the shade of a tree giving forth its beautiful song, with the dark green as a background. It is very robin-like in its movements, and when singing frequently jerks up its head after the manner of that bird. It moves along the branches in a very taking manner, and when singing lets its wings fall below the tail; the colours show out very brightly.

The two adults and young were obtained in a very shady spot. On the male being wounded and falling to the ground, the female went down to him, and both were secured, a pair not having been seen together before. The young one could fly, and also had to be shot.

178. *PACHYCEPHALA PECTORALIS MELANURA.* Black-tailed Thickhead.

Pachycephala melanura (Gould), Proc. Zool. Soc. (Lond.), 1842, p. 134, 1843. Derby, North-west Australia.
No. 311—♂. Length, 6.6 inches (25/7/86).

180. *LEWINORNIS RUFIVENTRIS COLLETTI.* Western Rufous-breasted Thickhead.

Pachycephala rufiventris colletti (Mathews), Austral. Av. Rec., Vol. I., p. 41. Parry's Creek, North-west Australia.
No. 188—♂. Length, 6.5 inches (26/6/86).
Irides, reddish brown; bill and feet, black.
No. 189—♀. Length, 6.2 (26/6/86).

Bill brown, lower mandible lighter at the base. The above are a pair shot together.

No. 197—♂ Length, 6.7 (27/6/86).

Irides, reddish brown; bill, legs, and feet, black.

No. 275—♀. Length, 6.8 inches (17/7/86).

No. 354—♂. Length, 6.7 inches (2/8/86).

No. 476—♂. Length, 6.7 inches (29/10/86)

The males of this subspecies are very shy, and not easily obtained, the females and young birds are easily shot. Their note is full and sweet.

A Day in the Mallee.

By F. E. Parsons, R.A.O.U.

The new railway from Tailem Bend to Paringa passes through very uninteresting and monotonous looking country for the average traveller; the first 100 miles being through dense dwarf mallee covering slightly undulating sandy soil. The only break in the monotonous outlook being an occasional small galvanized iron humpy, and a clearing of 100 or 200 acres.

To anyone interested in ornithology the country is however, extremely interesting, and suggests great possibilities to one able to spend a few hours in the scrub, for no forms of bird life are more interesting than those whose habitat is the vast unfrequented mallee covered areas between the River Murray and the Victorian border.

During the first week in May I had occasion to go to Pun-gonda siding, on the Paringa line, and as the trains only re-

turn to Adelaide every other day, I found that after completing my business, I had to wait a day for the next train. My time was fully occupied in observing and collecting some of the many species of birds to be found in the district. The wheat stack at the siding was very dilapidated, due to the ravages of mice, and a large quantity of the grain was loose and strewn about; this had attracted scores of Crested Bronzewing Pigeons (*Ocyphaps lophotes*), Mallee Parrots (*Barnardius barnardi*), and Blue Bonnets (*Northiella haemagaster xanthorrhoea*), which seemed to like the idea of being able to secure such a feed without the necessity of fossicking for it.

A specimen of *Barnardius barnardi* was shot from a pine tree, and while the shot holes were being plugged, great interest was being taken in the operation by three striped honey eaters (*Plectorhyncha lanceolata*), a butcher bird (*Cracticus* sp.), and a beautifully plumed mallee parrot (*Barnardius barnardi*), all of which were hopping about on the lower branches of the pine tree over my head, while two beautiful pink cockatoos (*Lophochroa leadbeateri*) circled aloft, evidently attracted by the large piece of white cotton wool. Only eight years ago I noticed flocks of many scores of these beautiful cockatoos in this district, but residents inform me that it is rarely many of these birds are seen now.

An unexpected bird was met with on the more open country; the chestnut-crowned babbler (*Pomatostomus ruficeps*). These were present in great numbers; they are extremely energetic and active birds, and at once attract attention by their snow white fronts and peculiar calls. This bird is by far the most rowdy of the three species found in South Australia.

Another unexpected bird procured was the short-billed crow (*Corvus bennetti*). These birds were plentiful in the district, and are shot by the farmers whenever occasion arises, because of their decided liking for fowls' eggs.

Several magpies were seen, all of which were the black-backed variety (*Gymnorhina tibicen*).

Three species of tit warblers were noticed (*Acanthiza pusilla hamiltoni*, *Acanthiza uropygialis*, and *Geobasileus chrysorrhous*). These birds prefer the pine country, and frequently all three species could be seen feeding on the ground together.

Many companies of the black-backed wrens (*Malurus melanotus*) were met with, but unfortunately the beauty of

this little bird was lost, as none of the males was in full breeding plumage.

Some other species identified with certainty were as follows:—

Geopelia placida tranquilla (peaceful dove).—These graceful birds went about in little flocks of 6 or 12 birds, and would come about the doors of the farm houses.

Zonifer tricolor (black-breasted plover).—Four or five birds could always be seen in a cleared grass paddock.

Uroaetus audax (wedge-tailed eagle).—Only one noticed; it was soaring aloft. A nest was seen of this species, built in a large mallee in a secluded part of the scrub.

Polytelis anthopeplus (black-tailed parrot).—Only five birds were seen. I think these birds are plentiful closer to the River Murray.

Psephotus varius (many coloured parrot).—Several of these were met with in the scrub, but only a pair at a time; they were very confiding, and could be approached to within a few yards.

Whiteornis goodenorii (red-capped robin).—Many pairs of this species were seen; they seemed to be always close to the pine clumps.

Seisura inquieta (restless fly catcher).—A very common bird; the residents of the district thought it was the common willie wagtail (*Leucocirca tricolor*), but none of that species were noticed.

Pseudartamus cyanopterus (wood swallow).—This species was very plentiful; not many were noticed during the day, but towards dusk they came in large numbers to roost in blackwood trees close to the house. They clustered together, but did not hang on one another like bees swarming, as I understand they do sometimes. First five or six settled on a short bough, then others settled on them, and then others, until a dark mass was formed about 18 inches high, but all the birds were above the supporting bough. Some birds were very much lighter in colour than others; they may have been immature birds, or perhaps a sub-species.

Oreoica cristata (crested bell bird).—These were fairly numerous, especially where the growth was not too thick. They would run under a bush and remain stationary for quite a long time.

Aphelocphala leucopsis (white face).—These birds were plentiful, and often were in company with *Acanthizae* about the pine clumps.

Neositta pileata tenuirostris (black-capped tree runner).—This is a very restless bird, it is never still. Five or six would quickly make their appearance, and just as quickly depart, flying from tree to tree always searching under the bark for insects, working spirally down the tree trunk.

Pardalotus punctatus xanthopygus (golden-rumped diamond bird).—A very common bird in the mallee. It can always be detected from the following species by its mournful single note call.

Pardalotus striatus subaffinis (red tipped diamond bird).—Also a very common bird, and like the foregoing species very often the first indication of its presence is the snapping of its bill in procuring insects from the leaves sometimes only six or eight feet above one's head.

Acanthagenys rufogularis cygnus (spiny-cheeked honey eater).—These birds are very numerous, and have a very varied lot of calls.

Lichenostomus ornatus tailemi (yellow-plumed honey eater).

Ptilotula penicillata (white-plumed honey eater).—These two species are the commonest birds of the mallee country.

Although only one day could be spent among the birds, quite a number of interesting forms were met with, and I am sure that it would be difficult to find a tract of country in South Australia more prolific as regards variety and interest, especially in the nesting season.

The Grey-faced Petrel (*Pterodroma macroptera* Smith)—A New Record for the S.A. Coast.

By F. R. Zietz, R.A.O.U.

Contribution from the S.A. Museum.

One of these birds, a female, was picked up alive on the Brighton beach, on the 19th of August, this year. Evidently it had been blown ashore by the heavy westerly gales which were experienced at that time. Its general colouration is a brownish black, showing a lighter colour where the feathers have become worn when being buffeted about in the storm, evidence of which was found in the bruised condition of the wings, when the bird was being skinned. The feathers of the forehead, lores and chin are greyish brown, a velvety

black patch in front of each eye. Eyes dark brown; bill and feet, black.

The following measurements were taken in the flesh:—

Total length	395 m.m.
Culmen	34 m.m.
Wing	315 m.m.
Tail	127 m.m.
Tarsus	41 m.m.
Spread of wings	1045 m.m.

Notes from Humbug Scrub.

By T. P. Bellchambers.

August.—Discovered two nests in garden belonging to white-bearded honey eaters. Nests situated low down in pines, and lined with kangaroo fur.

August 1st.—Nest of white-plumed honey eater and two eggs.

August 1st.—Nest of babblers building.

August 1st.—Tits have built a nest in roof of cottage.

August 1st.—Landrail still here very quiet.

August 10th.—Night Heron paid visit to dam.

August 10th.—My hybrid ducks have started sitting; male keeps guard as usual with black duck.

August 10th.—Pet Teal paid us a visit, for two seasons, she has nested away from home each time, bringing home brood when grown up, but they did not stay.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

By His Son, S. A. WHITE, M.B.O.U.

XIV. THE ORNITHOLOGIST AND SAILOR.

Samuel White, writing under Monday, July 5th, states:—

"This morning I started early to try and find the *Paradisca* that was seen yesterday, but did not see a trace of it. Returned in the afternoon wet to the skin as usual, and with four birds only. Andrews as usual secured nothing.

Cockerell went back some distance in the island and struck a piece of good country, where he procured three lovely little kingfishers and two *Paradisæa apoda* in full plumage with the exception of the side plumes. The country is so dense in most places that it is impossible to travel through it, and just now water is oozing out everywhere; and although the islands have the appearance of being low throughout, they are really quite hilly in some places, having rather deep ravines in many instances, and so thickly entangled with fallen trees, vines, and other undergrowth, that is impossible to penetrate this thick mass without cutting a way in. The weather to-day has been wet, rain began to fall about 10 a.m., and heavy showers fell all the afternoon. The natives came off in numbers again when they saw me come off to the craft, bringing all sorts of things. I purchased birds, rats, seeds, shields, bows and arrows, reptiles, and many other things. Some natives coming down the Watalli Channel would not part with two plumes for less than 20/ a piece."

The 6th was spent on board the yacht owing to the continuous and heavy rain, all day. Samuel White and his taxidermists occupied their time skinning and curing birds, reptiles, etc., my father doing the bulk of the work as usual. The officers and members of the crew amused themselves mending their clothing and reading. A number of natives came off to the boat, bringing five birds, three plumes, besides numbers of shells and some bananas, all of which were purchased with calico, tobacco, and beads. During the day a large canoe came down from Batuli at the east end of the Watalli Channel. These men wore calico round them, were very clean, but could speak neither Malay nor English. Next morning Samuel White landed with his two collectors. The weather was threatening, but the rain kept off. My father and Cockerell followed a creek which led into the interior of the island of Wokan. There was water in the creek which ran over a bottom of coral and petrified shells, being clear of scrub, formed a rough road. The stream was followed for about four miles, and was found in places to be ankle deep, and in others up to the traveller's waists. At four miles the creek branched off into many small streams, the largest of which was followed for another three miles, when it became so overgrown and choked up with vines and thick scrub, that it had to be left. My father says in his notes:—"Proceeded to a little rising ground, and after a short search we heard *Paradisæa apoda*."

We went under a large tree and imitated the bird's call, which sounds like the words 'wark,' 'wark' repeated five or six times in succession. We had not long to wait when a bird in full plume came into the tree and perched on a bough directly over my man's head and commenced dancing in their peculiar fashion, with its golden plumes spread out and waving in the wind, it seemed but an instant and the report of my companion's gun rang out, and the bird was writhing amongst the wet leaves, for it was raining fast. It was a lovely bird with full length of plumes, which were of a deep rich golden orange, tipped with light brown; the bill was blue, and its bright eyes saffron yellow. A broad ring round the base of the bill as far back as the eye was of a deep rich green, and the hair-like feathers stood on end like plush. On the throat and under part of the neck the feathers are short and stiff, and of a rich shining emerald green; the chest is of a deep purplish brown; the under part deep chocolate brown; the top of the head and back of neck, rich straw yellow; the feathers of the head are short and stiff, and stand on end; but lengthen as they proceed down the back of the neck; the back wings and tail are a deep rich chocolate brown; the shafts of the two centre tail feathers are lengthened out beyond the tail to a length of 20 or 30 inches, and are of a wiry nature. This is a glorious bird seen in its native wilds, and this is the first adult *P. apoda* I have seen in the flesh. The chief object of my calling at the Aru's is accomplished, for I have the first great bird of paradise. It is the largest of the genus, and is the size of a crow, measuring $27\frac{1}{2}$ inches from tip to tip of wings, and from tip of bill to the end of short tail feathers, $18\frac{1}{2}$ inches. We secured two other specimens, one a female, which was all chocolate brown, deeper on the head and chest, and is a smaller bird; the other a male, wanting but the side plumes to make it perfect. The birds require to be 8 or 10 years old before they are quite perfect, then they become exceedingly shy. The tree under which we stood happened to be one which the birds select to "dance in." He was attracted by the noise we made, and came to his accustomed place to display his beautiful plumes, and was unconscious of our presence. Several more were heard and looked for, but the rain fell in torrents without ceasing, the sun had been obscured all day, and every rivulet was now swollen to a foaming torrent. The large creek by which we came up was full of muddy water, so we had to take to the scrub, and not being able to see the sun, mistook the bearings and came

out on the west side of the island beyond where Andrews was lost. The beach along the coast is rocky and impassable, and as darkness was coming on we could not think of going through the scrub again, so made up our minds to wait till morning on the shore, but just as light was going a native prau came past on its way to the mouth of the Watalli Channel. We waded out and boarded the native craft. After a long time poling along the coast, on and off reefs, we got near enough to make our people hear us, as the yacht had that day dragged her anchor about two miles down stream. A boat came off and took us on board at midnight. The weather had been excessively wet, the rain poured down continually all day till dark, when it eased up for a short time."

It is only a keen field ornithologist who can enter into the deep feelings which impelled my father to write these notes. Can the reader follow this wonderful field worker wading up a stream past his waist treading over the cruel coral, forcing his way through prickly jungle, rain falling incessantly, soaked to the skin. Then all is forgotten, and he is kneeling amidst the wet fallen leaves of a tropical jungle with a great bird of paradise in his hands; there on the spot he is noting up the colour of the soft parts before they fade in death, not only that, but taking notes of the wonderful lustre of the great bird, and he says in his notes he has accomplished that which brought him to the Aru Islands, and had seen *Paradisca apoda* in all its glory in its native habitat. Taking his precious prize he has to plunge into the jungle, gets off his bearings, and comes out many miles along the coast from the yacht, rain falling all the time; at midnight he is able to change and get food. Not a word of complaint or comment upon the great privation is found in his notes, for he had succeeded in his quest. His must have been indeed a constitution of iron, but he overdid it as the sequel of this short sketch will show. The next day, the 8th, was again wet, so my father and his two collectors remained on board and cured specimens, the owner of the yacht trading with the natives, which thronged the vessel all day. It required no end of time and patience to trade with these men. "No" would be said to one man twenty times or more, yet still he would persist in offering his stuff. My father gave orders to shift the yacht about two miles up stream, and the anchor was dropped just off the end of the island in ten fathoms of water over a rocky bottom. In between the showers during the afternoon Cockerell took the dinghey and pulled on shore

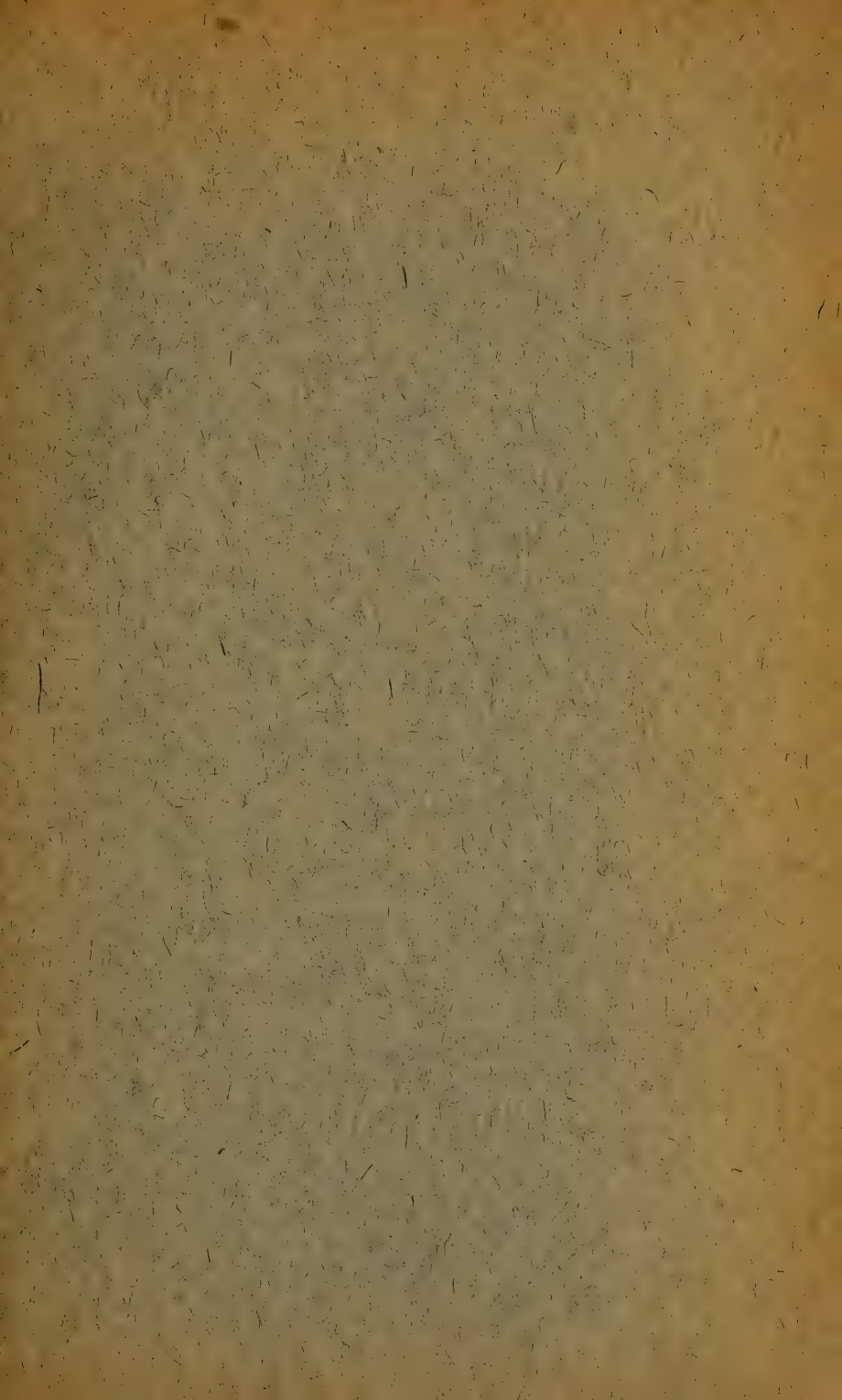
and secured a few parrots. The natives brought off some birds as well as a fine wallaby, which were all traded for. In my father's notes dated the 9th he writes:—"I did not go on shore to-day, but stayed on board to skin some birds and do some writing, but the natives pestered me so much that I could not get on with my work. Anything the natives have to barter the Malays or Macassar men seem to take in hand for them, and prove far more troublesome than the Aru men. I was hours to-day bartering for two birds. Some wanted rice, tobacco, calico, rope, and one man wanted the ship's anchors. Cockerell came on board in the afternoon with some birds, so I went on skinning again. Andrews came off in the evening with nothing as usual. I bartered and traded with the natives to-day for a few insects, besides seeds, shells, animals, etc. Rain fell off and on all day, but the evening is clear." The night was clear and fine, but at daylight rain began to fall. My father ordered a boat out, and landed with Cockerell. They came off to the yacht in the afternoon drenched to the skin, with a few birds. The latter were almost spoilt owing to being unable to dry them during such damp weather, the atmosphere being so charged with moisture. Andrews went on shore during the afternoon, but came off without a single specimen. The natives crowded on board all day. Birds, insects, shells, etc., besides a plume were traded for. It was laughable to see them come on board with all manner of things. One man would have a joint of bamboo filled with worms, centipedes, and such creatures; another a basket full of dead shells picked up from the beach; a boy would have a small basket filled with pieces of basiana leaves, each piece folded and tied up with a piece of split rattan, in each parcel there was a bug, a small beetle, or a spider, a grasshopper, or a cockroach. They brought small birds shot with blunt arrows, strung through the nose with split cane, live birds tied by the legs to a piece of stick by rattan, birds eggs, bows, arrows, spears, and numerous other things. As each man presented his article for trade he would cry "Tombacco" (tobacco) "Mama mama" (beads), or whatever he wished for, but when a plume was offered rupees were asked for, and if by chance they took trade for it, they would take care to receive or demand twenty shillings worth. They seemed to have a set commercial price, and it is like personal estate to them. It still continued raining day and night. On the 11th some notes show that Samuel White served out the week's stores to the cook as usual, then set to


work at his writing. The weather was very wet up to noon, when Cockerell and one of the crew took a boat and pulled over to the other side of the channel, where there was a creek. He brought back a few birds, amongst them a half-plumed "*apoda*". The natives were on board all the afternoon with all kinds of rubbish in leaves. Two birds were bartered for, but several others were so knocked about that they were of no use. The weather in the evening gave indications of clearing up.

In some notes dated the 12th my father writes:—"This morning I had a boat swung out and landed a little way up the channel. I made my way to a large fig tree which was in fruit, where a variety of birds assembled. I stayed till about 2 p.m. and secured 12 birds. Cockerell went over on to Kobror and took two half-plumed *apodas* and two king bird of paradise (*Paradisea regia*). I bartered for a few small birds, besides other things, from the natives, when I returned to the yacht. The weather has been splendid to-day, the sun shone out warmly, and we were enabled to dry sails, clothing, etc. The wind blew fresh from the S.E."


On the 13th all hands remained on board. My father and his two collectors skinning birds and animals all day, the former dealing with the natives as they came on board with specimens. The natives soon found that the "Rajah" had a set price (i.e., a stick of tobacco), for small birds which were shot with blunt arrows, and this gave less trouble. Birds, lizards, shells, seeds, eggs, rats, etc., were secured during the day. The crew listed the yacht and painted her at the water line. The weather was very fine, rather warm in the middle of the day.

On Wednesday, 14th, Samuel White writes:—"This morning I made my way to the fig tree again, and secured several beautiful pigeons. Returned to the yacht, and made preparations for a boat expedition up the Wanumbi Channel taking stores for a fortnight."





W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.





J. H. Riley

Vol. III.

Part 5.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st JANUARY, 1918.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.
A. M. MORGAN, M.B., Ch.B.
S. A. WHITE, M.B.O.U.
F. R. ZETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd

Grenfell Street, Adelaide.

CONTENTS.

	PAGE
The South Australian Ornithological Association	127
Order Coccyges, Family Cuculidae, Genus Heteroscenes . . .	129
Birds of Port Broughton. A. M. Morgan, M.B., B.Ch. . . .	132
Birds of the North and North-West of Australia (No. 13). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U. . . .	137
Birds observed in the Neighbourhood of Pungonda, South Australia. Edwin Ashby, M.B.O.U.	141
Cuckoo Eggs in Blue Wren's Nest. F. E. Parsons, R.A.O.U. . .	145
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	145



— THE —

South Australian Ornithologist.

VOL. III.] 1st JANUARY, 1918. [PART 5.

The South Australian Ornithological Association.

Report of meetings held at the Royal Society's room,
North Terrace Adelaide.

SEPTEMBER 28th, 1917.

The President, Mr. A. G. Edquist, occupied the chair, there being only a moderate attendance. Mr. J. D. Connor, who was nominated at the last meeting, was duly elected a member. The President read a letter which he had received from the head teacher of the Napperby School commenting upon the unusual number of water birds present this season, and mentioned several instances of protected birds having been found shot. The school children were keenly interested in their protection, and asked for a further supply of bird protection notices.

Mr. J. W. Mellor reported that he had observed the Harmonious Thrush devouring the black woolly caterpillars (larvae of the moth *Spilosoma glatygna*). Four cuckoos were noted in the district, namely the Pallid, Fan-tailed, Bronze, and Narrow-billed Bronze. Mr. Mellor also recorded the Glossy Ibis at Fulham, a very unusual visitor to the district.

Mr. A. Crompton gave a very interesting account of birds observed during a short holiday at Yunta Creek.

Mr. B. Henderson reported a curious nesting place of swallows, the birds having built their nest on top of the shower in a bath room of one of the River Murray steamers.

The rest of the evening was devoted to discussion of Mathew's Hand List Nos. 540 to 549 (Ground Thrushes and Ephthianuras). Owing to the small meeting there was not a large range of specimens tabled, those exhibited being from the S.A. Museum and Mr. F. E. Parsons' private collection.

OCTOBER 26th, 1917.

The monthly meeting was held on Friday evening in the Royal Society's rooms, North Terrace. Capt. S. A. White presided.

Mr. E. Ashby reported having seen many Shell Parrots (*Melopsittacus undulatus*) at Blackwood this season.

Mr. J. W. Mellor also stated that these birds were plentiful at Lockleys, and seemed to be travelling north. Mr. Mellor gave interesting notes upon birds observed for the month at Lockleys. He stated that the landrails were numerous in the crops, and remarkably quiet. The Masked Owl (*Tyto alba delicatula*) was plentiful, and the Laughing Jack (*Dacelo gigas*) was nesting in the hollow gums. The Native Hens (*Microtribonyx ventralis whitei*) were much in evidence. Interesting bird notes sent in by Mr. Bellchambers were read.

The chief item of the evening was an account given by Mr. Ashby of a few days' trip made by Mr. F. Parsons and himself to a locality between the Paringa Railway line and the Victorian border. Mr. Ashby described the country, and exhibited birdskins collected by the two ornithologists during their brief stay. Among them were the red-capped babbler, red-backed wren, white-browed tree creeper, crested pigeon, Barnard's parrot, Gilbert's thickhead, yellow-throated minah, lanceolated honey-eater, black and white swallow, and white-throated nightjar.

The Hon. Secretary (Mr. F. M. Angel) was requested to convey the sympathy of the members to Mr. Saunders during his severe illness.

NOVEMBER 30th, 1917.

Mr. A. G. Edquist presided. An apology was received from Capt. S. A. White, who was away investigating the spread of sparrows along the Great Western Railway.

Mr. Edwin Ashby reported that the White-browed Babbler (*Pomatostomus superciliosa*) had been observed at Blackwood taking young sparrows from their nest and dropping them to the ground. Dr. A. M. Morgan confirmed this habit of this useful bird.

Mr. F. R. Zietz stated that Black Ducks were reported to have nested in old crows' nests at Mundoo, but on inspecting the locality on a recent trip he found that the crows had cleared them all out.

The principal business of the evening was an account by Dr. Morgan of a trip to the Port Broughton district. An interesting description of the country visited and the birds inhabiting it was given, about 70 species having been identified. A small collection of skins was exhibited, and included what was considered a new subspecies of *Acanthiza iredalei*. The members were interested in an unusual nest of the Thickhead, the one exhibited having been constructed in bracken with green grass and macerated gum leaves. The Doctor also, showed a curious clutch of the eggs of the Little Shag, one being fully and others partially lime-coated.

In view of the Christmas holidays it was decided not to hold a meeting in December.

Order Coccozyges, Family Cuculidae, Genus Heteroscenes.

Heteroscenes pallidus.—Pallid Cuckoo.

Description.—Adult male, general colour above greyish-brown, a white spot on the nape. Forehead, throat, sides of body and under surface ashy grey. Centre of abdomen and under tail coverts white, the latter with narrow brown cross bars.

Wing.—Primaries and secondaries brown, with white cross bars on their inner webs. The inner webs of the basal portion of the secondaries, and the upper edge of the wing, white.

Tail.—Blackish brown, notched or barred with white on both webs of the feathers.

Legs and feet olive.

Bill.—Black base of lower mandible olive.

Iris.—Brown.

Orbital ring.—Bright yellow.

Inside of mouth.—Orange.

Measurement.—Total length in flesh, 310 m.m.; wing, 196 m.m.; tail, 163 m.m.; bill, 19 m.m.; tarsus, 20 m.m.

Adult female.—All under surface brownish grey, lighter on the flanks and vent, the feathers of the former being faintly barred with dark grey; sides of neck and throat mottled with black and rufous; wing coverts strongly mottled with pale grey and rufous; tail feathers barred on both sides with rufous and white; upper tail, grey and elongated like those of male, and often mottled with white; under tail coverts white with a few dark markings. Bill.—Olive brown, becoming yellow at the gape; inside of mouth, deep orange.

Feet.—Yellowish brown.

Orbital ring.—Yellow.

Iris.—Brown.

In some cases the female has the white spot on the nape.

Young.—Both sexes are much lighter in plumage than the adults. Both are mottled, but this is less marked in the male in which sex the rufous tint is very faint. The female takes on a deep rufous mottling from the nest, and retains most of it throughout life. In Captain S.A. White's collection are specimens from the eastern states, showing very little rufous on the throat, and the black marking on that part of the body are very faint, and show a greyish tint.

The difference between male and female was first pointed out in these pages by Captain White. Previous to that time the mottled bird was considered to be the immature form.

Distribution.—The whole of Australia including Tasmania. Birds from the Northern Territory and Western Australia have been described as subspecifically distinct.

Habits.—They are strictly migrating, arriving on the Adelaide plains from the north about the middle of July, though Mr. J. W. Mellor has noted them at the Reedbeds as early as the middle of June. In the hills they are not usually seen until the end of July or early in August. They do not congregate in flocks. The birds very usually single, or at most in twos when one is generally chasing the other. They perch always on an exposed branch of a tree, or upon a fence post, and prefer open plains or thickly timbered country to the thick scrub. Much of their time is spent upon the ground, where they get most of their food. They leave the Adelaide district probably about the beginning of December, and go northward, but how far is not known, but they have not so far been observed outside of Australia. The greater number of the birds seen on the Adelaide plains are on passage, probably for the Eastern States, for eggs and young birds are very rare in this district.

Song.—When on the wing they utter a harsh discordant scream; but when perched the note is very different. It is thus described by Mr. E. Ashby, who, with a musical friend, took careful notes of it. "The melancholy whistle commences with a note uttered several times; then rising in a series of five to eight semi-tones and completing the effort by repeating the final note several times. As far as my observations go the series of half tones, with a rising inflexion is usually limited to five or six, but there is a considerable variation in the number of times the bird repeats the first or the final notes." It is said that the whistling note is sometimes uttered when on the wing. In the Adelaide district the birds are silent or almost so on their first arrival, and also for some time before their departure. When uttering the whistling note, the male sits with the head up and the wing drooped, this note is not made by the female, but both sexes have the harsh flight call. The whistling call is uttered at night, more commonly on moonlight nights; but also when quite dark.

Flight.—Rapid, straight, and undulating.

Food.—Consist entirely of insects and their larvae; a favourite food is hairy caterpillars, the stomachs of all the birds being found lined with their sharp hairs. This circumstance formerly gave rise to the statement that cuckoos had hairy stomachs.

Nest.—They build no nest, being purely parasitic in their nidification. In this State the egg is invariably laid in the nest of some species of honey-eater. The commonest being the Greenie. (*Ptilotula pennicillata*); the Minah (*Myzantha melanocephala*); the black-capped Honey-eater (*Melithreptus lunatus*); the Wattle-bird (*Coelia carunculata*); and the singing Honey-eater (*Meliphaga sonora*.)

Eggs.—As only one egg is laid in each nest, the number laid by one female is unknown. The egg is oval in shape, but slightly smaller at one end. The ground colour is a light yellowish pink sometimes quite uniform, and sometimes with faint indications of spots of a somewhat darker hue and occasionally with one or two sharply defined small dark brown spots; there is seldom any indication of a zone. Two eggs measured A. 2.35 c.m. x 1.70 c.m.; B. 2.45 c.m. x 1.80 c.m.

Birds of Port Broughton.

By A. M. Morgan, M.B., B.Ch.

Port Broughton is situated upon an arm of the sea on Spencer's Gulf, about midway between Port Pirie and Wallaroo. The surrounding country was originally dense mallee scrub, now all cut down and replaced by wheat, except along the roads, all of which have a belt of scrub on either side of track; and, two or three small patches which have so far escaped. The largest piece of virgin scrub is a government reserve of about 100 acres, near Clement's Gap, about 15 miles from the township. The creek is margined by large mangroves, and there is a mangrove covered island, about four miles below the town. On the western side of the creek is a large samphire swamp, intersected by many small creeks. There is also on this side a large patch of acacia and sheaoak scrub. There is a fine well-kept hotel, the landlord of which Mr. Wall, is most obliging in assisting visitors to see the district.

Birds observed.—

(1) *Coturnix pectoralis*—Stubble Quail.—Very common, constantly heard calling in the wheat fields.

(2) *Austroturnix velox*—Button Quail.—Several birds were put up and one was found dead in the mangroves.

(3) *Phaps chalcoptera*—Bronze-wing pigeon.—Rare, occasionally heard calling in the mallee at Clement's Gap.

(4) *Microtribonyx ventralis whitei*—Black-tailed native hen. Seen in thousands on a swamp near Snowtown.

(5) *Thalasseus bergii poliocercus*—Crested tern.—A few birds seen fishing over the creek.

(6) *Bruchigavia novæhollandiæ ethelæ*—Silver Gull.—Very common, they sometimes come right into the township.

(7) *Gabianus pacificus*—Pacific Gull.—There were always a few birds hovering about the end of the jetty.

(8) *Hydrochelidon leucopareia fluviatilis*—Marsh Tern.—Seen in numbers hovering over a swamp near Snowtown.

(9) *Haematopus ostralegus longirostris*—Pied oyster-catcher. A single bird seen on a mud flat at low tide.

(10) *Lobibyr novæhollandiæ*—Spur-winged plover.—A few birds seen on the borders of the mud flats.

(11) *Leucopoliis ruficapillus*—Red-capped dotterel.—Common on the beach, a few were in pairs, but most of them were in small flocks.

(12) *Glottis nebularis glottoides*—Greenshank.—A few solitary birds were seen feeding near the edge of the mangroves.

(13) *Carphibis spinicollis*—Straw-necked ibis.—Seen on a swamp near Snowtown.

(14) *Herodias alba*—White egret.—Seen on the Snowtown Swamp. A flock of seven roosted during the day on the mangroves opposite the town.

(15) *Nptophoyx novae-hollandiae*—White-fronted heron or blue crane.—Common along the shores of the creek.

(15) *Notophoyx novae-hollandiae*—White-fronted heron or on the Snowtown swamp.

(16) *Mesocarbo ater*—Little black cormorant.—Common in the water and roosting on the mangroves.

(17) *Hypoleucus varius hypoleucus*—Orange-faced cormorant. Very common, many hundreds roosted at night in the mangroves opposite the town. There is a large "rookery" of these birds on the mangrove island to the north of the town; consisting of hundreds of nests in the mangroves. The bushes which have been occupied for some years are all dead, presumably killed by the guano; the nests were not occupied at the time of our visit, as in the locality the breeding season is the autumn.

(18) *Microcarbo melanoleucus*—Little pied cormorant.—Fairly common usually in company with the last species.

(19) *Circus approximans gouldi*—Swamp hawk.—Not common, an occasional bird seen hawking over the crops or samphire flat.

(20) *Cerchneis cenchroides*—Kestrel.—Not common, a few birds seen in each patch of scrub.

(21) *Pandion haliaetus cristatus*—Osprey.—A solitary bird sat on top of the mast of a yacht in the harbour, for the greater part of one afternoon. I was told that a few years ago, a pair built a great stick nest on one of the beacons marking the channel, but it had fallen down at the time of our visit.

(22) *Leptolophus auricomis*—Cockatoo parrot.—A pair seen investigating hollows in the mallee.

(23) *Psephotus varius rosinae*—Many-coloured parrot.—Only two pairs seen in the mallee bordering the roads.

(24) *Melopsittacus undulatus*—Shell parrot.—Very common, seen daily in small flocks, and also nesting in the hollow mallee trees.

(25) *Cosmacrops ornatus*—Bee-eater.—Common. They were in pairs preparing to nest.

(26) *Neochalcites basalis mellori*—Narrow-billed bronze cuckoo.—Not common.

(27) *Lamprococcyx lucidus*—Broad-billed bronze cuckoo.—Only seen once.

(28) *Hirundo neoxena*—Welcome swallow.—Very common; breeding.

(29) *Cheramocca leucosternum stonei*—Black and white swallow.—A pair found nesting in a sand bank near Bute.

(30) *Lagenoplastes ariel*—Bottle swallow.—Uncommon; only a few birds seen in the township, none elsewhere.

(31) *Microeca fascians*—Brown flycatcher.—Very common; breeding. A newly hatched chick was quite naked, black, and had the eyes closed.

(32) *Whiteornis goodenovii*—Red-capped robin.—Fairly common; they had apparently finished breeding.

(33) *Smicrornis brevirostris viridescens*—Short-billed tree-tit. Seen occasionally in the short mallee.—Not common.

(34) *Lewinornis rufiventris inornatus*—Rufous-breasted thickhead.—Common in the patches of mallee and along the roads; a bird shot proved to be a male in breeding condition, but in female plumage. Iris, dark brown; legs and feet, dark grey; inside of mouth, yellowish white. Total length, 17.75 c.m.

(35) *Rhipidura flabellifera whitei*—White-shafted fantail.—Only a solitary bird seen.

(36) *Leucocirca tricolor*—Wagtail.—Common; breeding. Some had young out of the nest, while others were still building.

(37) *Seisura inquieta*—Restless fly-catcher.—Several pairs seen; one pair was feeding large young.

(38) *Coracina novæhollandiæ melanops*—Black-faced cuckoo shrike.—A few birds seen apparently only passing over.

(39) *Lalage tricolor*—White-shouldered catterpillar bird.—Many pairs seen; one male bird seen building nest.

(40) *Morganornis superciliosus*—White-browed babbler.—Common; they had finished breeding.

(41) *Cinchorhamphus cruralis cantatoris*—Black-breasted song lark.—Very common in the wheat crops and grass lands.

(42) *Epthianura albifrons*—White-fronted tin-tac.—Common on the samphire flats. Breeding.

(43) *Poodytes gramineus dubius*—Grass bird.—Common on the samphire flats. Breeding.

(44) *Acanthiza pusilla hamiltoni*—Red-rumped tit.—Common in the mangroves, and also in the mallee; a male and female were collected. Total length 11 c.m. Iris, light brown; bill

upper mandible black, lower dark horn colour; legs and feet, dark brown; inside of mouth, black.

(45) *Acanthiza uropygialis augusta*—Chestnut-rumped tit. Not common; one pair found breeding.

(46) *Acanthiza iredalei* sub. sp.—These birds were common in a patch of acacia and sheoak scrub. Across the creek from the town. A male and female collected differ considerably from western and central Australian specimens, and will probably be described as a new sub-species. Total length, ♂ 10.25 c.m.; ♀ 10 c.m. Iris, white; bill, black; legs and feet, very dark brown.

(47) *Geobasileus chrysorrhous addendus*—Yellow-rumped tit. Common in the mallee and about the township. Breeding.

(48) *Pyrrholaemus brunneus*—Red-throat.—While "chirping" up some acanthizae in the acacia scrub, a male of this species came within a few feet of me, this was the only one seen.

(49) *Sericornis maculatus* sub. sp.—Common in the mangroves. Iris, light grey; legs and feet, light brown; bill—upper mandible, dark brown; lower, light brown. Total length, 13 c.m. I have not been able to determine to which sub-species this specimen belongs.

(50) *Leggeornis lamberti assimilis*—Purple-backed wren.—Common in the acacia scrub, the mallee and the tall samphire; very shy, a male bird had the iris dark brown; bill, black; legs and feet, dark brown.

(51) *Pseudartamus cyanopterus*—Dusky wood-swallow.—Fairly common in the mallee. They were in pairs, and some of them still building their nests. No other species of wood-swallow was seen. Probably on account of the good season inland they have not migrated this year so far south as usual.

(52) *Colluricincla harmonica victoriæ*—Grey shrike thrush. Common in the mallee and about the township.

(53) *Grallina cyanoleuca*—Magpie lark.—Only one pair seen near the township.

(54) *Gymnorhina hypoleuca leuconota*—White-backed magpie.—Common, nesting in the mallee along the roads and in the scrub. Some had young out of the nest, while others were still sitting.

(55) *Bulestes torquatus*—Butcher bird.—Fairly common in the mallee; one pair was feeding young out of the nest.

(56) *Oreocica citata clelandi*—Crested bell-bird.—Very common; often seen on the roads. They came almost into the township, and could be heard calling from the hotel.

(57) *Aphelocephala leucopsis*—White face.—Uncommon; a few pairs only seen in the mallee.

(58) *Neositta pileata tenuirostris*—Black-capped tree-runner; one small flock seen, consisting of three males and one female. Their nest measured the highest side, 11 c.m., opening, 6 x 5 c.m.; depth of cavity, 4.5 c.m. There were some bits of newspaper in the lining. The female measured 11.80 c.m.; total length. Iris, orange brown; ring round eye, bright yellow; bill, yellow at base, dark reddish brown at tip; legs and feet, bright yellow; inside the mouth, flesh colour. All the males were bringing food to the sitting bird. The nest contained three slightly incubated eggs.

(59) *Zosterops lateralis westernensis*—Silver-eye.—A few birds seen in the acacia scrub near the sea.

(60) *Pardalotus punctatus xanthopygus*—Yellow-rumped diamond bird.—Fairly common in the mallee.

(61) *Pardalotinus striatus subaffinis*—Striped diamond bird. Uncommon; only one bird seen.

(62) *Melithreptus atricapillus mallee*—Brown-headed honey-eater.—Fairly common in the mallee; a male collected had the iris, dark brown; bare skin behind eye, dull yellow; inside of mouth, orange. Stomach contents, caterpillars.

(63) *Plectorhyncha lanceolata neglecta*—Striped honey-eater. A pair seen building a nest in a sandal wood (*Myoporum* sp.) overhanging a road.

(64) *Meliphaga sonora*—Singing honey-eater.—Very common; some of them had young out of the nest, while others had fresh eggs.

(65) *Lichenostomus ornatus*—Yellow-plumed honey-eater.—Common in the mallee; a male collected had the iris, dark brown; bill, black; legs and feet, brownish grey; inside of mouth, yellow. Total length, 15.5 c.m.

(66) *Myzantha flavigula*—Yellow-throated minah.—A few pairs found breeding in the mallee, not common.

(67) *Acanthagenys rufogularis cygnus*—Spiny-cheeked honey-eater.—Very common; most of them had finished nesting, but one nest was found with young about a week old; the chicks were clothed with scanty grey down—eyes not open.

(68) *Anthus australis adelaidensis*—Pipit or ground lark.—Seen in the open country; not common.

(69) *Mirafra javanica secunda*—Common in the wheat crops. All the birds seen were very light in colour.

(70) *Corvus coronoides*—Raven.—Common in all classes of country. They had finished breeding.

Birds of the North and North-West of Australia.

From Skins and Notes made by the late Capt. T. H.
Bowyer-Bower.

BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., etc.

No. 13

186. *SETOSURA SETOSA* TORMENTI. Western Fantail.
Rhipidura setosa tormenti (Mathews), Austral. Av. Rec.,
Vol. I., p. 90, 1912. Point Torment, North-West Australia.
No. 232—♂. Length, 6.7 inches (29/8/86).
Irides, dark brown; bill, black; legs and feet, brownish
black.
No. 283—♀. Length, 6.9 inches (6/9/86).
No. 289—♀. Length, 6.9 inches (7/9/86).
No. 291—♀. Length, 6.7 inches (8/9/86).
No. 482—♂. Length, 6.8 inches (31/10/86).
This male was shot from the nest where it had been sit-
ting. The eggs have a creamy white back ground.
187. *MYIAGRA RUBECULA* YORKI. Northern Leaden Flycatcher
Myiagra rubecula yorki (Mathews), Nov. Zool., Vol. XVIII.,
p. 321, 1912. Cape York.
Nos. 22, 23—♀. (4/5/13).
Thursday Island, off Cape York, North Queensland.
188. *MYIAGRA RUBECULA* BROOMEI. Western Blue Flycatcher.
Myiagra rubecula broomei (Mathews), Austral. Av. Rec.,
Vol. I., p. 90, 1912. Napier Broome Bay, North-West Aus-
tralia.
No. 61—♂. Length, 5.4 inches (29/5/86).
Bill, blackish grey; legs, black.
No. 112—♀. Length, 5.9 inches (8/6/86).
No. 237—♂. Length, 6.1 inches (29/8/86).
Irides, brown; bill, lead colour, with tips and edges of
mandibles black, which colour continues in the form of a fine
line from the tip for a short distance up the culmen; legs and
feet, black.
No. 306—♀. Length, 6.1 inches (12/9/86).
No. 317—♀. Length, 5.9 inches (27/7/86).
No. 351—♀. Length, 6. inches (19/9/86).
No. 407—♂. Length, 5.9 inches (17/10/86).
No. 454—♀. Length, 5.8 inches (27/10/86).

Irides, brown; bill, bluish slate colour with black tips, the lower mandible has more of this colour than the upper.

No. 461—♂. Length, 6.1 inches (28/10/86).

Irides, dark brown; bill, fine bluish-lead, with tips and cutting edges black; legs and feet black.

188. *MYIAGRA LATIROSTRIS TORMENTI*. Western Broad-billed Flycatcher.

Myiagra latirostris tormenti (Mathews), Austral. Av. Rec., Vol. I., p. 91, 1912. Point Torment, North-West Australia.

No. 269—♂. Length, 6.1 inches (3/9/86).

189. *SEISURA INQUIETA NANA*. Little Flycatcher.

Seisura nana (Gould), Ann. Mag. Nat. Hist. Ser. 11, Vol. VI., p. 224, 1870. North-West Australia.

No. 449—♀. Length, 7.1 inches (25/5/86).

Bill and feet black. This bird will fly to the branch of a tree, and by a quick motion of the wings remain suspended in the air, after the fashion of the kestrel, during which time it gives forth a harsh, quickly repeated note apparently with the object of shifting any insects that were in the bark, as generally after so doing it ended in the bird flying away with some insect.

No. 65—♂. (29/5/86).

Irides, black; bill, black, base of lower mandible bluish; feet and legs, black.

No. 75—♀. Length, 6.9 (1/6/86).

Irides, dark brown; upper mandible, black; lower, bluish with black tips; legs and feet, black.

No. 91—♀. Length, 7.1.

Upper mandible, black; lower, bluish white; tips, black; legs and feet, black.

No. 393—♀. Length, 7.2 (12/10/86).

191. *SYMPOSIACHRUS TRIVIRGATUS ALBIVENTRIS*. White-vented spectacled Flycatcher.

Monarcha albiventris (Gould), Proc. Zool. Soc. (Lond.), 1866, p. 217. Cape York.

No. 19—(4/5/13). Thursday Island, off Cape York.

193. *CORACINA NOVAEHOLLANDIAE SUBPALLIDA*. Western Black-faced Cuckoo Shrike.

Coracina novaehollandiae subpallida (Mathews), Nov. Zool. Vol. XVIII., p. 326, 1912. Strelly River, Mid-West Australia.

No. 170—♀. Length, 13.2 (22/6/86).

Bill and feet black.

No. 306—(22/7/86).

Bill and feet black.

- No. 355—♀. Length, 12.5 inches (2/8/86).
 No. 390—♀. Length, 12.3 inches (9/8/86).
 No. 231—♀. Length, 13.1 inches (29/8/86).
 Irides, dark brown; bill, legs, and feet, black.

195. LALAGE TRICOLOR INDISTINCTA. Pale-rumped Caterpillar-eater.

Lalage tricolor indistincta (Mathews), Nov. Zool., Vol. XVIII., p. 328, 1912. Wyndham, North-West Australia.

No. 47—(immature) ♂. (26/5/86).

Upper mandible and tip of lower, brown; the base of the lower, yellowish white; feet, black.

No. 82—♂. Length, 7.5 inches (2/6/86).

Irides, brown; bill, brown; the base of the lower mandible, whitish; feet, black.

No. 270—♀. Length, 7.2 inches (4/9/86).

No. 349—♂. Length, 7.2 inches (31/7/86).

No. 299—♂. Length, 7.4 inches (21/7/86).

202. POMATOSTOMUS TEMPORALIS NIGRESCENS. Dark Babbler
Pomatostomus temporalis nigrescens (Mathews), Nov. Zool., Vol. XVIII., p. 335, 1913. Strelly River, Mid-West Australia.

No. 149—♀. Length, 9.6 inches (19/6/86).

Irides, dark brown; bill, dark horn, lighter at base of the culmen and base of the lower mandible; legs and feet, black.

No. 153—♂. Length, 10.2 inches.

No. 155—♀. Length, 9.8 inches (19/6/86).

Irides, light yellow; bill, black; base of the culmen, bluish white, base of the lower mandible, bluish white; legs and feet, black. Common, and lives in families of twelve to fourteen. The nests are roughly made of twigs, oval in shape, the long axis placed horizontally, the entrance hole being at the side, placed about fifteen feet from the ground. The birds are very noisy, and move from one tree to another, going first to the lower branches, and then mounting by jumps or hops to the top ones, when they would fly off to another some 15 or 20 yards off.

No. 348—♂. Length, 9.6 inches (31/7/86).

No. 371—♂. Length, 9.9 inches (26/9/86).

No. 372—♂. Length, 10 inches (4/8/86).

Irides, straw yellow; bill, brown, lighter on the culmen, and yellowish white on the sides of the lower mandible, and becoming white at the base; legs and feet, dark brown.

205. CINCLORHAMPHUS CRURALIS ROGERSI. Northern Brown Song Lark.

Cinclorhamphus cruralis rogersi (Mathews), Nov. Zool., Vol. XVIII., p. 338, 1912. Derby, North-West Australia.

No. 194—♂. Length, 9.7 inches (27/6/86).

Irides, brown. This bird has a peculiar flight, and its tail appears very long in comparison to the bird as it sails quietly before going down to the long grass.

No. 298—Length, 9.2 inches (10/9/86).

Irides, olive-brown; upper mandible, light brown, lower one white, tinged with white at the tip; legs and feet brownish.

No. 359—Length, 9.8 inches (22/9/86).

No. 365—Length, 9.9 inches (3/8/86).

205. PTENOEDUS MATHEWSI SUBALISTERI. North-western Rufous Song Lark.

Cinclorhamphus mathewsi subalisteri (Mathews), Nov. Zool., Vol. XVIII., p. 339, 1912. Parry's Creek, North-West Australia.

No. 55.—Length, 7.9 inches (27/5/86).

Irides, dark brown; bill, light horn; basal half of lower mandible, whitish; legs, fleshy grey. This bird flew up to a small bush from some green grass, and it threw up its tail in a peculiar jerky manner.

No. 271—♂. Length, 7.9 inches (4/9/86).

No. 270—♂. Length, 8.1 inches (17/7/86).

No. 371—♀. Length, 6.6 inches (4/8/86).

Irides, greyish brown; upper mandible, light brown, paler on the cutting edges, and white towards the gape, lower mandible white tinged with flesh colour; tarsi and feet flesh colour, the latter shaded with light brown.

209. AUREPTIANURA CROCEA TUNNEYI. Orange-breasted Chat.

Epthianura crocea tunneyi (Mathews), Nov. Zool., Vol. XVIII., p. 342, 1912. South Alligator River, Northern Territory.

No. 276—♀. Length, 4.6 inches (18/7/86).

Irides, greenish white; eyelid, brown; bill, brown, gradually shading into whitish horn colour at the basal half of lower and basal portion of the cutting edge of the upper mandible, gape white; legs and feet, greyish black, lighter on the under parts of the toes.

No. 283—♂. Length, 4.7 inches (19/7/86).

No. 284—♀. Length, 4.6 inches (19/7/86).

No. 286—♀. Length, 4.5 inches (19/7/86).

No. 288—♀. Length, 4.5 inches (19/7/86).

No. 322—♂. Length, 4.8 inches (15/9/86).

Irides, greenish white.

No. 324—♀. Length, 4.8 inches (15/9/86).

Irides, greenish white.

No. 326—♀. Length, 4.8 inches (15/9/86).

Irides, greenish white.

These birds allow one to get quite near, and then fly off to a small bush not far distant. They are always found on a kind of salt bush which grows near the lagoon in some 4 or 5 inches of water, or in the long rank grass growing out of the water. They appear to feed on insects, after which they carefully look over the small bushes.

These birds were seen flitting among some strong weedy grass growing out of the water, and appear to hang therefrom and peck insects off the water. They utter a very simple call note, but no song. Females and young are easily obtained, but males are rare. When disturbed they take safety in some grass some 50 yards from the swamp.

No. 355—♂. Length, 4.8 inches (25/9/86).

No. 356—♂. Length, 4.8 inches (25/9/86).

No. 357—♂. Length, 4.8 inches (25/9/86).

No. 366—♀. Length, 4.8 inches (25/9/86).

Birds observed in the Neighbourhood of Pungonda, South Australia.

By Edwin Ashby, M.B.O.U.

Messrs. F. E. Parsons, R.A.O.U., M. E. Saunders, R.A.O.U., and the writer paid a hurried ornithological trip to the Pungonda district in the second week in September last. Mr. Parsons preceded us and had the tent erected in a patch of pines (*Callitris*) situated a few hundred yards from the station or rather siding. We reached the locality after dark on the 10th September.

With the first streaks of dawn on the morning of the 11th we listened to the chattering notes of the (*Pomatostomus ruficeps*, Hartlaub), Chestnut-crowned Babbler. Some of the notes were not unmusical, and their cries quite as varied, though distinct, as those of the familiar White-browed Babbler.

There was a large number of these birds in this clump of pines, and we found them just as common in similar country right up to the Victorian border and for several miles

inside. Mr. Parsons examined a large number of nests; a large proportion were empty, the rest, with one exception, had young.

The White-browed Babbler was noticed in one place near the Victorian border by Mr. Parsons, but evidently the former is the Babbler of this district.

Of Pigeons two species were noticed (*Ocyphaps lophotes*, T. & L.), Crested Pigeon, were very numerous, a few specimens of (*Cosmopelia elegans neglecta*, Mat.), Brush Bronze-winged Pigeon, were flushed in a large belt of timber on the boundary.

Both the Stubble Quail (*Coturnix pectoralis*, Gld.), and the little (*Austroturnix velox*, Gld.) Eastern Little Quail, were fairly common.

Three swallows were noted: the Welcome Swallow, Tree Swallow, and Eastern Black and White Swallow; after dusk the latter entered their holes which had been bored in the railway cutting near the siding, several of both sexes were caught out of the same hole.

Two species of Tree Creeper were met with in the pines and bull oaks. The Brown Tree Creeper (*Neoclima picumna australis*, Mat.), and the White-browed Treecreeper (*Climacteris erythrops superciliosa*, North). One specimen of the latter was secured near Pungonda, and a pair in the Bull Oaks on the Victorian side of the border.

Of *Acanthizas* two were represented (*Acanthiza pusilla hamiltoni*, Mat.), Red-rumped Tit, and *A. uropygialis*, Gld.), Chestnut-rumped Tit, to which of the races that have been given sub-specific rank these should be referred to I cannot say.

Of the Thickheads *Lewinornis rufiventris inornatus*, Gld., was common, and a pair of *Gilbertornis gilberti*, Gld., was secured.

The genus *Malurus* was represented by two species: (*Leggeornis lamberti morgani*, White), Southern Blue-breasted Wren, and (*Malurus melanotus*, Gld.), Black-backed Wren, the latter were very numerous on the margins of salt-bush flats, especially where the dense bushes were three or four feet high.

In the same bushes that form the favourite haunts of the Black-backed Wren, (*Pyrholaemus brunneus*, Gld.), Redthroat was met with; these birds were as usual exceedingly shy, a great deal of ill spared time was spent in securing three birds of this species.

Four species of the Hawk family were noted, and Mr. Parsons inspected several nests of the Wedge-tailed Eagle; some contained eggs and others young birds.

Of Honey-eaters eight species were noted, but others not jotted down on ones list were certainly there. The most interesting were (*Cissomela nigra ashbyi*, Mat.), Black Honey-eater; this diminutive little bird was noted in all places visited, attention being called to it by its low mournful whistle. One nest with two eggs was found, placed in the fork of a dead mallee about three feet from the ground. Attention was called to the Striped Honey-eater (*Plectorhyncha lanceolata neglecta*, Mat.), by its loud call; specimens obtained are darker in the markings than those obtained from the North of Adelaide; it is not unlikely that birds from this district are similar to the Victorian race.

The only Minah in the district visited was the Yellow-throated Minah (*Myzantha flavigula*, Gld.). These were nesting, and clutches of eggs were found.

A score of miles North-West of Pungonda, on the River Murray, Mr. Parsons found the Southern Black-headed Minah quite common, and further to the South-West I myself found in the smaller mallee this genus represented by the Black-eared Minah (*Myzantha flavigula melanotis*, Wilson), the form obtained apparently is similar to the race found throughout what is spoken of as the North and Lower North of South Australia. The Owlet Nightjar (*Aegotheles cristata*, White), was numerous and nesting, several clutches of eggs obtained.

Of Pardalotes the Yellow-rumped and South Australian (*striatus*) were both common.

The Southern Brown Song Larks (*Cinclorhamphus cruralis cantatoris*, Gld.), were on the salt bush flats and in a little grassy depression in tall mallee there were several pairs of the Eastern Rufous Song Lark making the shallow valley echo with their pleasing song.

Rose-breasted Cockatoos (*Eolophus roseicapillus*, Vie.), and the Pink Cockatoo (*Lophocroa leadbeateri*, Vig.), were scattered in small flocks or in twos and threes throughout the district. They were mostly seen feeding on the ground on wide grassy flats.

The district was remarkable for the numer of species of Parrots represented, and also for the number of individuals observed (*Barnardius barnardi*, V. & H.), Mallee Parrot, was everywhere, but the Many Coloured (grass) Parrot was almost as numerous, and exceptionally brightly coloured; they were remarkably tame; one allowed me to watch it for several minutes while it preened its plumage, almost within arm's length. The other parrots noted were the Blue Bonnet (*Northiella xanthorrhoea*, Bon.), Shell Parrot (*Melopsittacus*

undulatus, S. & N.), Cockatoo Parrot (*Leptolophus auricomis*, Swainson), but at Loxton, 18 miles away, Mr. Parsons saw the Black-tailed Parrot (*Polytelis anthopeplus*, Lear.), and on the river at the same place (*Psephotus haematonotus*, Gld.), Red-backed Parrot. To this list may be added several of the Lorikeets, in all a remarkable number of representatives of the Order *Psittaciformes* to be met with in so short a time in practically one locality.

On a small salt lagoon there were something under a dozen Dotterel, curiously enough, representing three species: Red-kneed Dotterel, Red-capped Dotterel, and the Black-fronted Dotterel.

COMMENTS.

The district under review was of exceptional interest to those of us to whom it was a first visit. The soil was red, heavier on the flats, red sandy loam on the rising ground. The flats are separated by low broad undulating sandy ridges, always having an east and west direction. The crowns of these sandy rises are covered with Pines (*Callitris*), which are exceptionally well grown, and in between the pines and on the lower slopes grows an abundance of grass, the flower stalks forming a waving mass nearly two feet high. There are very few bushes amongst the pines. The only mallee met with may be termed large, some having the trunks equal to those of respectable trees; nearly all the mallee was on the Victorian side of the Boundary. One patch of tall Bull Oaks 30 to 40 feet high was visited, also on the Victorian side of the fence.

The only patch of smaller mallee visited was a mile or so to the south, and there only was the typical sand hill scrub met with, and the only true mallee bird, *Hylacola cauta* was noted; it is therefore pretty evident that to obtain the more typical forms of birds that make the mallee peculiarly their home one would have to go a good deal to the south. In the list of species mentioned above the Small-billed Crow (*Corvus bennetti*, North), should have been included; the two nests visited had young, in one case recently hatched, in the other almost fledged.

Altogether 70 species of birds were identified, but this does not by any means exhaust the list that would be met with during a longer stay (we had only three days for work, and on one it rained nearly all the time), also if the mallee country a few miles to the south was explored, many additional birds should be noted.

Cuckoo Eggs in Blue Wren's Nest.

(By F. E. Parsons, R.A.O.U.)

At Middleton on October 5th, 1917, I found a nest of the Blue Wren (*Malurus cyaneus leggei*) containing three eggs, one of which was very faintly marked with fine spots, and at first I took it to be an egg of the bronze cuckoo, but it was a lightly marked wren's egg. However, after removing the three eggs I noticed an egg of the narrow billed bronze cuckoo almost covered in the feathers lining the nest, this was carefully removed by pulling out some of the feathers, and I was surprised to see another egg of the cuckoo at a lower level, and after removing this second egg another cuckoo egg was found lower still.

The Wrens had evidently built and lined their nest when the first cuckoo egg was deposited, this they covered with feathers, then another cuckoo egg was placed in the nest, and the owners of the nest again covered it with feathers; the third cuckoo egg was then deposited in the nest, but the wrens evidently were not desirous of undertaking the responsibility of rearing the young cuckoo, and this egg was in its turn almost covered with feathers. The rightful owner of the nest then laid her three eggs. The egg cavity, however, was by this time about half filled with feathers.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

By His Son, S. A. White, M.B.O.U.

XV.—THE ORNITHOLOGIST AND SAILOR.

—A Trip to Wanumbi.—

In some brief notes made by my father, and dated from the 14th to 21st of July, he says: "About 1 p.m. on the 14th, I made a start in the largest boat, taking a crew of three men to pull, and one taxidermist. I gave instructions to make along the South side of the channel in which the yacht is lying, in a very short distance we saw a wide opening stretching away to the South with the tide running up strongly. I determined to try it, and steered the boat for the entrance. Later in the

day I ascertained from the natives, that it was the Wanumbi River. As we pulled up easily with the tide I could see that it was a river or channel, and not a blind inlet. At the entrance this river was about 200 yards wide, with dense mangrove scrub on either side. After this it gradually narrowed for about four miles, when it struck off into several branches, and I determined to follow the largest, but after following it for another three or four miles it rapidly decreased in width and depth, and in a short time ceased to be navigable at low water; in fact the river ends in a mass of bare rocks of a kind of limestone like hardened white clay, and appears to be coralline limestone, such as we found all through the islands. Fresh water was running into the river here at several places, and what appeared curious, there is scarcely any soil anywhere near the place; yet there is a dense growth of scrub growing as well as mangrove trees. At the top, or where the rock dries, at low water, is situated the village of Wanumbi, consisting of two houses raised on piles in the usual way, placed on a piece of rock about 300 yards from the creek, and surrounded with dense scrub, with the exception of a small piece of partly cleared ground, where there is shallow covering of black rich soil, and which the natives cultivate. * When we arrived the rocks were bare and dry near the creek, and it being a neap tide the water did not rise much that night, so we made our camp on the bare rocks, as all the scrub was wet and dirty after the continued heavy rains we have had lately, indeed the day we started was the first fine day we have had for a fortnight. Next morning we awoke with the water under us and all round us, the fire put out, and everything afloat, the water having covered every particle of the rock, so we had to take refuge in the boat. Seeing several old praus lying up, I determined to take possession and live in one if permission of the owner could be obtained; this was soon arranged, and after the old craft had the boat's sails thrown over, it made a very respectable dwelling, particularly so, as it rained all day, and night, then the weather cleared up, and the sun came out hotly. I took my gun and went into the scrub. Found numerous tracks or paths, but after the heavy rains they were half way up to the knees in sticky mud, and the roots of trees also stems lying about made walking very trying and troublesome. I saw villages of one or more houses and plantations everywhere during my rambles, frequently met men on their way from one home to another, always with a bow and a handful of

arrows, these men were always civil in showing the way, and invariably begged for a little tobacco; the women were rarely seen, and if met suddenly, they ran into the scrub till I passed, or if natives were with me they would stand on one side while we passed. Birds were not numerous, the call of the great bird of paradise was heard several times, but they were found to be young males or females. The news of my doings had reached Wanumbi before me, and all the boys and young men were off hunting with their bows and arrows, and brought in hundreds of different things daily. All sorts of rubbish, from a piece of fungus to a bird of paradise, each trifle wrapped and tied up in a separate leaf. The dealing and bargaining for these things or such as I wanted was at times laughable, while at other time very aggravating. They are more persistent and haggling kind of dealers, especially the Macassar men, they have no conscience, frequently asking a hundred times more than they will take, and never seem satisfied. These men will present a thing twenty times after being refused, always with the same cry, Tombocoo (Tobacco) or Mania Mania (beads), or pise (knife), or whatever he may have asked for first. They will try on many little schemes in dealing, such as presenting the worst article first. A man will tie up single beetles in separate leaves and offer one, and when that is purchased, he will present another, and so on for a dozen times he will present a small bird, while the rest are hidden in the cloth around his waist. I think these people have but little food to spare as the insignificant quantities that were offered me were not worth speaking of. Two small sweet potatoes have been offered for fifty times their value, one hen's egg, half a bunch of bananas, one cocoanut, and so on, if what they ask be paid, when they frequently say "tauba" (more). They swarm around the camp all day long, fill the place we live in, and will not move to allow us to move about to get our food, making a perfect babel of voices, they talk loud and incessantly, they are the noisiest people I ever came across. Nevertheless they have many redeeming qualities, they are civil and obliging, if it costs them nothing to be so highly good tempered and moral, and above all they are strictly honest, that is they do not steal, although they pried into anything we had, they did not take anything without asking, and I had many things laying about which were very tempting, especially red beads among the young people, a theft could be easily committed, and I could never find the thief. There were very many fine young men

amongst the crowd, and I felt grieved to see the beastly habit of chewing "Beetle Nut" carried to excess, some of the older men had their features positively distorted through that habit, if the habit is long continued gives the mouth a most ghastly appearance. There are not so many big bushy heads of hair amongst these men. Most of them have their hair cut short, some had their heads shaved. Most of the boys about ten or twelve years of age were seen chewing the horrid compound of nut, leaves and lime. Men and boys were out every day with their bows and arrows and shot me lots of small birds, great lizards and frogs, besides cuscus, rats, and bandicoots, it was holiday and feast time at Wanumbi while I was there. The country all around our camp is low, and was covered with a dense virgin scrub, and the soil does not seem to be deep anywhere. The birds were not numerous, and strange to say, I did not see a single adult great bird of paradise. Rats were numerous and very troublesome about our camp. Insects were not abundant. I secured a few good beetles, and one day secured about twenty-five butterflies, and many of the species were those found over the North of Australia. One must bear in mind that the month of July is not the best by any means for insects. Several times during my stay here I have taken two men and the boat at night and pulled down to the yacht and back with the tide. I always choose the night, because the air is cool and pleasant, and it surprised me much not to find more sand flies and mosquitos; they were not very troublesome, although we were surrounded by mangrove swamps. The banks of the river as we went to and fro presented a very beautiful sight, the banks themselves were low and muddy, covered at high water, but the river was hidden by the rich green foliage of the mangroves, which reached from the water's edge to 60 or 70 feet above it, to outward appearance as dense as a wall with breaks here and there on either side when small creeks and inlets join the main stream. Along the river the birds were not so plentiful as would be expected. We saw scarcely anything with the exception of a few small kingfishers perched on bare twigs near the water or on a mangrove root. To-day, the 20th. I shifted camp and came back to the yacht for there is only Cockerell to skin, and he is over done with material coming in. The same day we arrived at the yacht canoes came down from Wanumbi with specimens.

With the exception of two wet days the weather has been fine; the sky is always more or less overcast, and the sun comes out at times very warm."

The day following my father's return to the yacht was a very hard one, for there were many specimens to skin, and he and Cockerell were going day and night to catch up with the material as it came in.

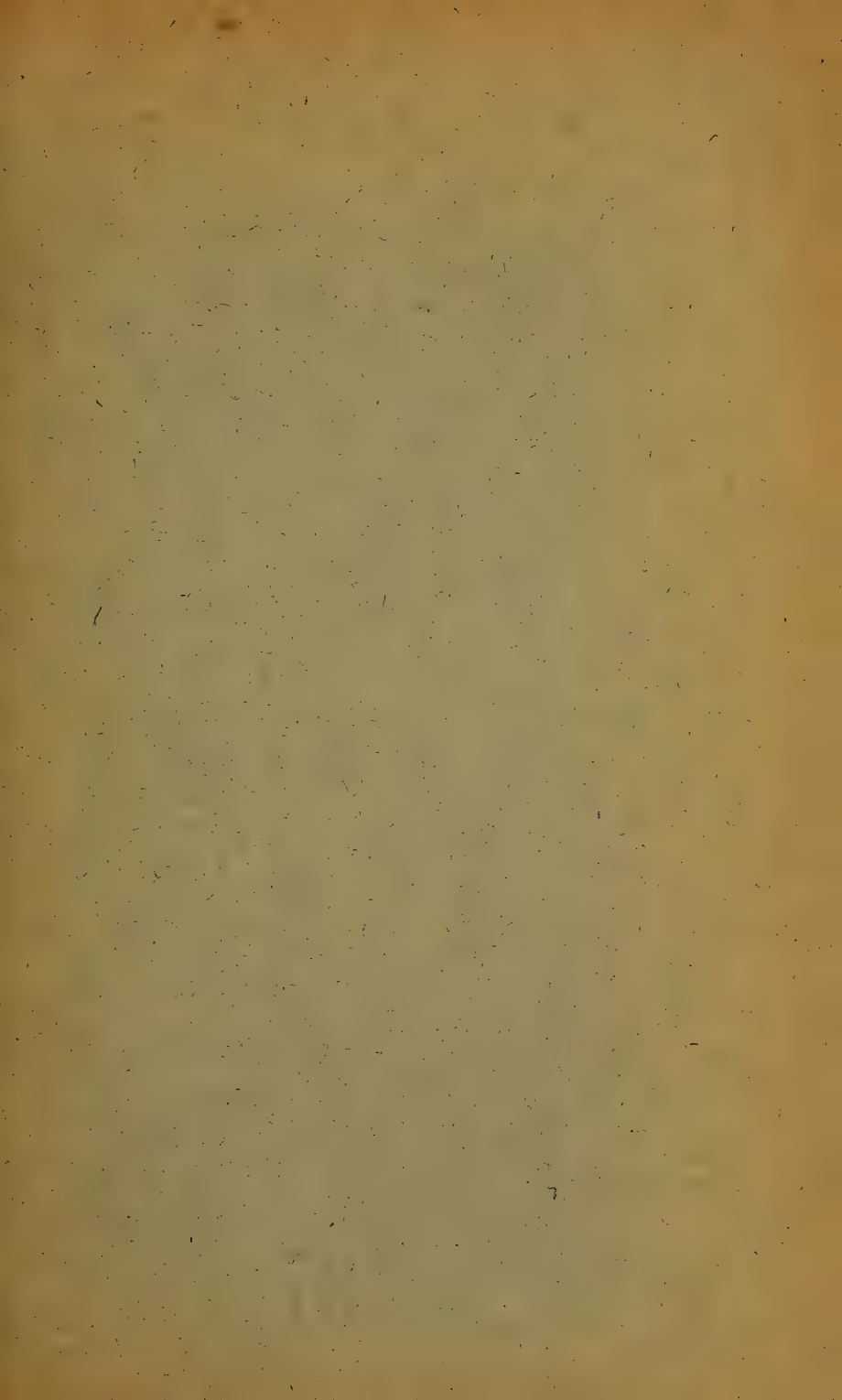
Under date of the 21st my father writes:—"Late last night and all day to-day Cockerell and I have been skinning, and have not yet cleared up. I have now obtained several "great birds" from the natives, but I am paying dearly for them, for I have to give a gun for each one—guns which cost me £3 15/ each; but I came here expressly for the great bird of paradise, and I am determined to have them at all cost. They are only found on two islands in the Arus, and are most glorious birds, as big as a crow, with most beautiful floating golden plumes more than two feet long. The bird is excessively shy, and lives in the densest part of the scrubs; the natives alone know their haunts. A number of birds and other things came in to-day brought by the natives." Next morning early my father and Cockerell were at it again, and it was not till nearly dark when all the material was finished up. Cockerell cleaned up the skinning room while my father packed away specimens to make room. A few small birds came in that day, and they were cured before turning in that night. The next morning, the 23rd of July, some natives came off to the yacht very early, and brought three full plumed *Paradisea apoda*, and one half-plumed bird. These were purchased with guns, powder, and axes. After breakfast Cockerell went up the creek on the Wokan side of the Watalee Channel and returned in the evening with one King Bird of Paradise (*Paradisea regia*), and several other species. Under the above date Samuel White writes:—"I remained on board to-day to skin two or three "great birds", for I want to make sure of good skins. I have paid away a great deal in trade for these birds now, but I find the only way to get the rare and shy bird is to offer an exorbitant price for it. There are natives hunting for the plumes of these birds in every part of Mykor and Wokan, and I feel sure these fine birds will be wiped out in the very near future. This evening a few small birds came in. The weather has been showery all day." My father writing again on the 24th says:—"I kept my two taxidermists in with me to-day, for there were many animals and birds to skin. I have given orders to Cockerell to keep to the birds, and have put Andrews on to the mammals and reptiles. The latter does not make as good a skin of the birds as I would like. The natives were off in several lots to-day, and brought


aboard ten small birds and two "Bunongmatti" (great birds of Paradise). The guns are all gone now, and it is difficult to deal with some of these natives; they know not what they want. We have cleared up this evening, and have no specimens left to skin. The weather has been showery; the first strong wind for several days blew for a few hours to-day." The next day Samuel White intended putting things straight on board the yacht, washing up, etc. He often said his cabin (where he kept his trade ammunition and a thousand and one things) "was like a pawn shop" upside down after haggling and bartering with twenty or thirty natives. From a rough note it appears that thirty to forty birds came in during the day besides mammals, shells, reptile, insects, crustacea, etc., etc., so it can be easily seen that my father or any of his staff had little time to clean up. My father says:—"Amongst the birds brought in to-day were two fully-plumed "great birds", and one king bird. I have to pay very heavily for everything, as I can see it is the only way to ensure a supply being brought in. Most of the men and the boys about the island prefer tobacco, but the Wonambi people want "mama mama" (beads) for everything. The people who visit us now up here are mostly Aru men, the Malays, and Macassar men generally live near the coast. The weather is still showery although we have a little sunshine between, the wind blew strongly and cool most of the day.

On Monday, 26th, my father and Cockerell stayed on board skinning all day. Andrews did some work amongst the mammals and reptiles, but seems to have been given up for odd jobs. He was not suited for hard work in the tropics. It can be easily seen that the work of trading with the natives was quite enough for my father without doing the bulk of the skinning, and he over-taxed himself far too much. The natives took so long in deciding what they would take for the stuff they brought in, haggled over it for hours, and the great naturalist could not lose his temper for it may offend them, and they would not come again. When a man brought anything for sale he would sit or stand about for an hour at least before he could make up his mind what price to ask. When he did make an offer to deal he would ask ten times as much as he would take. They did not mind standing about between decks filling up all the space on the yacht so that it was with great difficulty the crew could move about. In some notes upon this subject my father says:—"I have made it a practice now to offer a fair price for what is offered, and


if refused, not to deal for that article again at any price, so that some who know me will not refuse the price I offer. Their greed at times knows no bounds. A man came the other day with three cassowaries' eggs, and wanted a double barrelled gun for them, and when he could not get what he wanted he took the eggs away."







W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.





J. H. Riley

Vol. III.

Part 6.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st APRIL, 1918.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. M. MORGAN, M.B., CH.B.

S. A. WHITE, M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL,

c/o W. D. & H. O. Wills, Ltd
Grenfell Street, Adelaide.

CONTENTS.

	PAGE
The South Australian Ornithological Association	159
Order Passeriformes, Family Campophagidae, Genus Lalage . . .	161
A Trip on the Coorong and amongst the Bristle Birds on Young- husband's Peninsula. S. A. White, M.B.O.U.	164
Birds of the North and North-West of Australia (No. 14). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	174
Another New Record for South Australia. F. R. Zietz, R.A.O.U. .	180
Notes from Humbug Scrub. T. P. Bellechambers	181
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, M.B.O.U.	181

— THE —

South Australian Ornithologist.

VOL. III.]

1st APRIL, 1918.

[PART 6.

The South Australian Ornithological Association.

25TH JANUARY, 1918.

The Monthly Meeting was held at the Royal Society's Rooms, North Terrace, Adelaide, on Friday evening, 25th January, 1918. Mr. A. G. Edquist presided.

Dr. A. M. Morgan reported that a pair of Black-throated Grebe (*Tachybaptus ruficollis*) had nested in the Botanic Gardens. These birds had built a new nest, but unfortunately it had been interfered with and had floated away.

Mr. Edwin Ashby commented upon the great numbers of Shell Parrots (*Melopsittacus undulatus*) at Blackwood, and he believed they were nesting. The appearance of such vast numbers of these birds this year was discussed. Capt. S. A. White remarked that it is over 35 years since such numbers were seen on the Adelaide plains.

Mr. J. W. Mellor stated that he had seen two male birds Blue Wrens (*Malurus cyaneus leggei*) helping to feed the young birds.

Some interesting notes forwarded by Mr. T. P. Belchambers of Humbug Scrub were read. Those upon the Wood Swallow (*Pseudartamus cyanopterus*) caused discussion owing to Mr. Belchambers's statement that he had found these birds, which as is well known, eat numbers of bees, would only consume the drones. As these were always in excess of the numbers required, he contended that the birds were not doing any harm.

It was reported that a number of G. J. Broinowski's coloured plates of Australian birds were for sale in the city, and it was suggested that they might be of use to the Education Department. Mr. Edquist said he would look into the matter.

Mr. F. R. Zietz, the Museum Ornithologist reported a new record for South Australia. A pair of birds had appeared at Mylor in the Adelaide hills, which were not known by any of the residents. One specimen was secured, and forwarded to the S.A. Museum, and was identified as the Australian Roller (*Eurystomus orientalis pacificus*).

The rest of the evening was devoted to an account of the excursion undertaken by Dr. Morgan and Capt. White to Lake Victoria and the River Murray. Eight days collecting and bird-observing was done among the lakes and swamps around Lake Victoria, then they descended the river to Renmark with two boats, working the country ornithologically all the way down, and in all over 140 specimens were identified. A number of skins and eggs were exhibited also a number of interesting photographs. Although nothing new had to be recorded, many useful notes as to distribution and habits were obtained.

22nd FEBRUARY, 1918.

Mr. A. G. Edquist presided at the usual monthly meeting held on Friday evening, 22nd February, 1918.

Capt. C. H. A. Lienau and Mr. J. H. Welfare were proposed as new members.

The Secretary read a letter from the Brisbane Crows and Flying Foxes Destruction Board, asking the opinion of the Association as to whether the imported starling should be destroyed. An interesting discussion followed in which all the speakers strongly condemned the starling, and expressed the opinion that no effort should be spared to combat this pest. It was pointed out that the damage these birds do to the fruit and young wheat is enormous, besides which they are driving out our useful insectivorous birds. Mr. Mellor remarked that it is almost hopeless to keep them in check, and stated that he had shot 7 or 8 adult birds at a nest, but that did not prevent the young from being brought up. Capt. White instanced a similar case where 16 adult starlings were shot at a nesting hollow, and yet the young birds reached maturity. It was resolved to leave the matter in the hands of the Executive Committee to forward a recommendation from this Association.

Mr. J. W. Mellor drew attention to the numbers of Purple-crowned Lorikeets (*Glossopsitta porphyrocephala*), that were visiting the Adelaide plains. At Lockleys they were feeding upon the blossoms of the Tasmanian blue gum, and from the number of dead birds seen under the trees it would appear that the honey from these flowers was too strong for them.

The evening was set aside for consideration of the birds as Mr. Mathews' hand list Nos. 550/558 (*Ashbyia lorensis*). Desert Chat was exhibited and Capt. White gave a description of the habits and habitat of these birds.

Conopodera australis (Southern Reed Warbler). All present deplored the fact that the ranks of these lovely songsters were being depleted each year.

Cisticola exilis (grass warbler). The different sub-species of this bird were discussed.

Poodytes gramineus (Grass Bird). Each sub-species was debated, and Capt. White described the strange habit of placing curved feathers (invariably those of the bald coot, which are blue in colour) over their nests to keep out rain and sunshine.

Eremiornis carteri (Desert Bird); *Origina solitaria* (Rock Warbler); *Clithoncola sugittata* (Little Field Wren). Skins of these birds were exhibited from the Museum Collection by Mr. F. R. Zietz, and by Capt. White from his private collection. Several specimens were also shown by Mr. Frank Parsons.

Order Passeriformes, Family Campophagidae, Genus Lalage.

Lalage tricolor—White-shouldered Caterpillar-eater.

Description—Adult Male, Upper Surface.—Forehead to the middle of the back glossy metallic black. Lower part of back and upper tail coverts, light grey, faintly barred with dull white.

Under Surface.—White, the centre of the abdomen sometimes with a yellowish tinge.

Wing.—First primary black, the others, outer web black, narrowly edged with white, inner webs white at the base, black at the tips. The white mark increasing in extent from the 2nd onwards, secondaries black, outwardly edged and tip-

ped with white, inner webs white at the base, shoulder white; greater wing coverts white, with a broad streak of black down the centre of each.

Tail.—Black, the outer five feathers on each side tipped with white, the extent of white decreasing to the centre.

Bill.—Black.

Legs and Feet.—Black.

Iris.—Brown.

Adult Female.—Upper Surface—Forehead to middle of back, brown; lower back, greyish brown indistinctly barred with dull white; line over the eye light brown ear coverts greyish brown; upper tail coverts, light brown indistinctly barred with dark brown.

Under Surface.—Dull white, the sides of the neck, upper breast and flanks barred with brown.

Thighs.—Light brown, barred with dark brown.

Wing.—Primaries; brown the outer webs narrowly edged with dull white, inner webs dull white at the base, the extent of white increasing inwards. Secondaries, brown, outer webs edged with light brown; inner webs dull white at the base. Shoulder, light brown, mottled with dark brown. Great wing coverts, dark brown, broadly edged with light brown.

Tail.—Two central feathers, light brown, slightly tipped with white, two outer feathers dull black; the terminal half of the outer web, and the tip white, rest of the feathers dull black tipped with white.

Bill.—Brownish black, base of lower mandible yellowish grey.

Feet.—Ashy Grey.

Iris.—Brown.

The young of both sexes resemble the female except that the white of the under surface has a more yellowish tinge, and the transverse barring is more distinct.

Measurement.—Total Length (of skin) 18 c.m.

Wing.—10.2 c.m.

Tail.—Two central feathers light brown, slightly tipped with white, two outer feathers, dull black; the terminal half of the outer web, and the tip white, rest of the feathers, dull black, tipped with white.

Bill.—1.3 c.m.

Tarsus.—2.9 c.m.

Distribution.—The whole of Australia—They have been placed on the Tasmanian list, apparently in doubtful authority since Mr. Littler (Birds of Tasmania) has not been able to find the record. They have not been recorded from Kangaroo Island.

Habits.—They are purely migratory in the southern parts of the continent, arriving in the Adelaide district early in September, and departing late in January. They do not however, all come far south, as Captain White found them nesting in the Gawler Ranges, and on Cooper's Creek, and they have also been found nesting at Kallioota on Lake Torrens, in August. Males from the lower north, Central Australia, and the Northern Territory are usually not in full plumage, so that they possibly put off their breeding plumage while in their winter quarters. When on migration they travel in small parties never in large flocks. They perch usually in the leafy branches of the trees, or rest upon the ground.

Song.—At nesting time the song is very pretty, it is uttered by the male only, and chiefly when on the wing.

Flight.—Low and undulating, when singing at nesting time the flight is quite different, being then straight and rather fluttering.

Food.—Consists entirely of insects and their larvae.

Nest.—A shallow cup shaped structure placed in a horizontal fork of a tree, at a height varying from a few feet up to forty feet from the ground. The nest is built of strips of bark bound together with cobwebs, if near an orchard it may consist almost entirely of flower heads. The male alone builds the nest, and also does most of the sitting, the female only going on when the male is feeding, and is at once turned off by the male upon his return. It is said, however, that the female sits at night time. This arrangement seems to be one of Nature's mistakes for the brightly coloured male is very conspicuous, and his presence on the nest makes it easily discoverable, while the dull brown female harmonises well with her surroundings. The male also does most of the feeding of the young; the female only occasionally bringing a morsel for them. In former times these birds nested regularly in the Adelaide plains, but they have not been seen there for many years now, though they still commonly nest about Blackwood.

Eggs.—Two or three in number, the back ground varies from light apple green to dull greyish green, and the markings from bright reddish brown to dull brown. The markings are longitudinal, and are more thickly laid on at the upper end. They begin to build about the middle of October, and go on into December. Average measurement of twenty eggs, 2.18 c.m. x 1.62 c.m.

Largest egg—2.30 c.m. x 1.70 c.m.

Smallest egg—2.05 c.m. x 1.55 c.m.

A Trip on the Coorong and amongst the Bristle Birds on Younghusband Peninsula.

By S. A. White; M.B.O.U.

In the early morning of Monday, March 6th, 1916, the writer left by rail for Goolwa. I had two companions, Mr. Wyldé, sub-editor of the "Register," and Mr. Rogers, Jr. My two companions were out for a holiday, but my chief object was the procuring specimens and notes of the Southern Bristle Bird (*Maccoyornis broadbenti whitei*), Mr. Mathews having made the southern bird a sub-species of the Victorian one, from the material sent by the writer. Having parted with all the specimens I had at that time I was anxious to obtain some more to test the validity of the sub-sp. Not only was I able to do this, but had the great pleasure of spending many hours each day observing the strange birds. There has been very little written about the South Australian form, so that the notes incorporated in this paper upon the Bristle Bird should be of scientific interest.

Reaching Goolwa before noon, had our midday meal there, then boarded Wm. Buzzar's little motor-boat, the "Mary Ann." Having packed away all our luggage a start was made up the Coorong. Many who take this trip along the narrow strip of water with sand-dunes on one side, which shut out the ocean, on the other low lying limestone country on which grows in places malley and pines, think it monotonous and uninteresting, this is not so with the writer, for the ever-changing aspect of sandhills, either covered in sword grass or current bush, or may be white drift sand, then the picturesque pines and dense mallee on the other side have for me the greatest charm, and needless to say the numerous water-birds which nearly always frequent these waters are of a great and absorbing interest. Not from the gunners point of view, for apart from a bird now and again for food, I have long ago given up that which is known as sport. I can watch the water-fowl with glasses or naked eye for hours, admire and take note of their habits without feeling that I want to destroy under the name of sport these more wonderful of God's creations. We passed the Murray Mouth and steamed on over the placid water, the sun was setting and threw long shadows from the highest peaks of the sandhills over the great salt-water way, then the shadows faded out, and only the sharply-cut edges of the sand-dunes remained sharply defined

upon an evening sky of bright blue, upon which many bright twinkling stars were showing.

It was 9 p.m. when we dropped anchor off our camping ground, we threw our blankets and a few things into the dingey and rowed ashore. Making our way to the tents which our friend Mr. Buzzar had pitched a few days previously. No time was lost in getting some supper and then to bed. In the morning it was found that our camp was situated on a narrow strip of land between the sandhills and the Coorong. A few lignum bushes were scattered over a flat, and at the foot of the sandhill and around our camp a number of straggling bushes of the introduced tobacco plant (*Nicotiana glauca*) were growing. After breakfast my friends were anxious to get a brace of duck for the pot, so I accompanied them along the shore, till we came to one of those places where the fresh water was percolating through the sand and finding its way into the salt. This was the means of attracting a good many wild fowl, the day was a bright sunny one in Autumn, and the sunlight went dancing out over the water which was like the surface of a mirror. Sitting on the clean sandy beach I watched the antics of a pair of Musk Duck, the female was intent on feeding, but the male bird amused himself by swimming in circles half on his side, giving forth the deep peculiar call every now and again throwing jets of water quite a distance with his feet. The little Red-capped Dotterel and Black-fronted Dotterel as well as the Stints formed subjects for thought and observation. Nets were set for fish that evening, and our guide ran them early next morning, and he had a nice dish cooked for our breakfast, after which I went into the sandhills to look the country out for Bristle Birds. A large depression quite a mile long by nearly half that distance wide opened out before me with an amphitheatre of high hills all round. Most of the sand both in the depression and on the hills around was covered in high "Sword Grass," (*Lepidosperma gladiatum*) with a few low shrubs such as the "Currant Bush," (*Leucopogon Richi*.) It was not long before I heard the unmistakable alarm call of the Bristle Bird, and I afterwards discovered this was their stronghold for some distance round. Search as I would not a glimpse of a bird could I get, they kept so tight to cover. A few brush Bronze-winged Pigeons, (*Cosmopelia elegans*) were seen, and a Goshawk, (*Urospiza fasciata cruenta*). Just before sundown Mr. Wylde came out with me, we sat still and watched, and my friend succeeded in procuring the first Bristle Bird. The days were very warm,

in fact hot, and the nights cool with heavy dews. I had seen and heard Scrub-wren in large *lignum* bushes near our camp, but for a long while in spite of all my efforts could not secure one, but after many attempts succeeded, and as soon as I handled it it seemed new to me (see "S.A. Ornithologist," Vol. II., P. 169.)

Next morning I was out at peep of day and took up a position to watch for Bristle Birds, the whole of the depression under me was filled with dense fog at daylight, and it looked as if the deep depression were half full of snow or cotton wool, soon it began to rise and envelop everything around me for some time, soaking the vegetation in moisture, then the sun arose and pierced the great white pall that hung over the hills and valleys, as it rose the bright rays fell on a sand hill a hundred yards or more away. Here the morning song of Bristle Bird burst forth and was carried on down the gully, soon afterwards by the aid of glasses I saw two fine birds coming out on the bare white sand, chasing one another in a most playful manner. Their long tails which swept the ground gave them more the appearance of mammals or reptiles than birds, they were well out of range, and when I shifted they were gone like a shot. Returning to the camp for breakfast, and went out again in the evening to sit listening to the Bristle Birds' evening song, just as the sun goes down one bird starts, then it is taken up and passed on till out of hearing. Sitting perfectly quiet a bird darted over an open space to make cover on the other side, but I was too quick and procured it. Each day I was out at daylight collecting and observing, returning to a late breakfast. We would then row over to the mainland. On the 12th we did this and worked out amongst the sheoak and tea-tree scrub, quite a number of birds was found there. A pair of fine Wedge-tailed Eagles were soaring high up over head. As would be expected in sheoak country, the Narrow-billed Tree-runner was plentiful, as soon as we reached the tea-tree the familiar call of the Singing Honey-eater could be heard in many directions. The New Holland Honey-eater was also plentiful, the rich full note of the Harmonious Shrike-thrush was often heard, and several birds seen. The twittering call of the (*Melithreptus brevirostris*) could not be mistaken, as they flew from tree top to tree top in small parties. Yellow-rumped Tits were very plentiful, and several large parties of Red-rumped Grass Parrots were met with in the she-oak country. Spink-cheeked Honey-eaters were plen-

tiful, and their strange gurgling note was often heard, the noisy Minah was in evidence, the White-browed Babbler was also seen, the Striated Tit was moving about in large parties. A few Crows were observed flying over. We reached camp in time to have tea, and for me to get out amongst the Bristle Birds at sunset. There was a pair of Butcher-birds nearly always about the camp, and a fish was tied by the tail to one of the tobacco trees near our tents, every half hour they would come along, and have a great squabbling over the fish, pulling vigorously till they procured a good mouthful, then off they would go to a distant tree to swallow it, these birds were so bold that they would attempt to take the fish out of the frying pan, while the pan was on the fire. After a most successful time amongst the Bristle Birds I said goodbye to my friends, who were remaining, and at 4 a.m. on the 14th, boarded the motor boat with the owner, and we soon had the anchor up and on board, and were steaming for Goolwa. I witnessed one of the most wonderful sunrises I have ever seen, for the banks on either side were wrapped in a veil of mist, the sun like a ball of fire shining through this thick fog, appeared as if steeped in blood, and threw the most wonderful coloured lights upon the water, from which the fog or mist was rising in columns. Objects in the distance were magnified to many times their real size, stately old Pelicans looked like full-rigged ships, and when a party of these birds was swimming from one side to the other, they looked like a convoy of ships in full sail. A White-faced Heron standing on the bank appeared through the deceiving mists as large as an emu. The journey back was as full of absorbing interest for we were passing every few minutes some fresh species of birds, fine old Black Swans were seen feeding, their long necks thrust down, and their tails on end as they reached to the bottom for weed. Cormorants of several species, were sitting on the stones or the muddy bank, Gulls and Terns were continually passing up and down. One mottled black and white Tern was quite new to me, and I was unable to get a specimen. The motor boat grounded in the shallows, and we had to put my things into a dingey then pull on for a mile or more into deep water, where we found a motor boat going into Goolwa with a sporting party which we joined, and reached Goolwa in time to catch that afternoon's train to Adelaide. The weather all through had been very fine, the days rather hot at times, but cold nights often with dense mists or fogs.

The following is a list of the birds taken or observed during the trip, with the writer's remarks and field notes. The nomenclature is that of Gregory M. Mathews, F.L.S.. "List of the Birds of Australia, 1913."

Eudyptula minor undina (Gould). Fairy Penguin.—A specimen was picked up on the 90 mile beach, having been blown ashore, it agrees with other specimens I have seen, which makes me feel sure that there are two species of penguins off the Victorian and South Australian Coast, this being a much smaller bird in every way. Length 300 m.m.; bill, 26 m.m.; depth of bill, 9 m.m.; tarsus, 18 m.m. The bill is very much lighter in construction and the blue of the back is a very light bright blue.

Cosmopelia elegans neglecta (Mathews). Brush Bronze-wing pigeon.—Small family parties of these birds were met with in the sand-dunes, some so young that they were hardly able to fly.

Podiceps cristatus christiana (Mathews). Australian Tiptit Grebe.—Not many of these birds were seen. I was told by a fisherman that they are often found in their set nets. One specimen taken ♂ measured—length, 508 m.m.; wing from body to tip, 355 m.m.; spread of wings from tip to tip, 756 m.m. Stomach contents—Weed, particles of shells, three small fish, and a great many feathers. All the Grebe seem to be feather eaters.

Gelochelidon nilotica macrotarsa (Gould). Australian Gull-billed Tern. These birds were often seen in large parties skimming over the water.

Hydroprogne taschegrava strenua (Gould). Australian Caspian Tern.—Solitary birds were seen all through the day passing up or down the Coorong uttering their harsh calls, and more often than not they had their bright-red bills pointing downwards as they patrolled the waters in search of food.

Thalasseus bergii poliocercus (Gould). Crested Tern.—Small parties of these birds were seen continually passing up or down the Coorong, ever on the look out for food. When sighting a fish they shut up their wings and plunged into the water like a stone.

Sternula nereis (Gould). White-faced Ternlet.—These beautiful and graceful little birds were often seen, and their plaintive call heard.

Bruchigavia novae-hollandiae ethelae (Mathews). Southern Silver Gull.—Plentiful all along the Coorong.

Haematopus ostralegus longirostris (Vieillot). Pied Oyster-catcher.—A good many of these birds were met with on the flats or along the shore.

Haematopus niger fuliginosus (Gould). Eastern Black Oyster-catcher.—Only a single specimen seen of this species.

Lobibyx novaehollandiae (Stephens). Spur-winged Plover. These plover were numerous they were seen along the shore, on the flats when the tide was out, also on the grass land, a long way back from the water. They are most wary birds, and many other species depend upon them for the call of alarm. I have seen hundreds of birds of many species feeding contentedly, but upon the alarm note of the plover every bird had its head up and was ready for flight.

Leucopoliis ruficapillus (Temminck.) Red-capped Dotterel.—Numbers of these birds were met with on the flats at low water, and were also seen running along the sandy beaches.

Elseya melanops (Vieillot). Black-fronted Dotterel.—These birds were often seen, but not nearly as numerous as the preceding species.

Numenius cyanopus (Vieillot). Australian Curlew.—Met with all along the Coorong, and their weird calls were heard all through the night.

Vetola lapponica baueri (Naumann). Eastern Barred-rumped Godwitt.—Several birds seen along the shores and on the flats.

Pisobia minuta ruficollis (Pallas). Red-necked Stint.—Quite large flocks of these little birds were met with in many places. No doubt they were congregating prior to migration.

Erolia ferruginea chinensis (Gray). Eastern Curlew-Sand-piper.—A few examples seen in company with the last-named species.

Notophoxyx novaehollandiae (Latham). White-fronted Heron.—Numbers of these birds were seen silently watching by the water.

Chenopsis atrata (Latham). Eastern Black Swan.—A good many of these stately birds were seen in the swamps off the Coorong, they were very timid, due to being shot at most likely.

Casarca tadornoides (Jardine and Selby). Mountain-Duck.—A few observed flying low along the water and at night their deep-toned call, the male bird answering the female was often heard.

Anas superciliosa (Gmelin). Black Duck.—These fine ducks were not numerous, and moved about in pairs or three to four at the most.

Virago gibberifrons (Muller). Grey Teal.—These were by far the most numerous ducks on the Coorong. They congregate in numbers on the shallow waters covering the flats, when fresh water comes out of the sandhills and meets the salt water of the Coorong.

Biziura lobata (Shaw and Nodder). Musk Duck.—An old bird or two was often seen sailing about the inlets, the male birds submerged to the pouch under the bill.

Hypoleucus varius hypoleucus (Brandt). White-breasted Cormorant.—These birds were not as numerous as one would expect, great numbers are destroyed by the fishermen each year under the mistaken idea that they are injurious to the fishing industry.

Microcarbo melanoleucus (Vieillot). Little Cormorant.—Quite a number was seen sitting on the edge of the water, and on the stakes and posts in the water.

Urospiza fasciata cruenta (Gould). Lesser Goshawk.—A few birds seen, one taken a ♀ measured—length, 482 m.m.; spread of wing from body to tip, 449 m.m.; spread of wings tip to tip, 915 m.m.

Uroaetus audax (Latham). Wedge-tailed Eagle.—One or two birds seen flying high up.

Haliastur sphenurus (Vieillot). Whistling Eagle.—Only one bird seen.

Cerchneis cenchroides (Vigors and Horsfield). Nankeen Kestrel.—Occasionally seen hovering over the long grass.

Psephotus haematonotus (Gould). Red-backed Parrot.—These birds were numerous in the open scrub on the mainland. Three specimens taken showing no variation with the more northern bird. No. 1 ♀, total length, 258 m.m.; wing from body to tip, 171 m.m.; spread of wings, 380 m.m. No. 2 ♂, length, 279 m.m.; wing from body to tip, 171 m.m.; spread of wings, 380 m.m. No. 3 ♂, 279 m.m.; wing from body to tip, 177 m.m.; spread of wings, 380 m.m.

Neonanodes elegans (Gould). Grass Parrot.—A small party of these birds was feeding on grass seeds in the sand dunes, between the Coorong and the sea. One bird taken, ♂ measured—length, 229 m.m.; wing from body to tip, 152 m.m.; spread of wings, 337 m.m.

Hirundo peorena (Gould). Welcome Swallow.—Quite a number observed.

Hylochelidon nigricans caleyi (Mathews). Tree-Martin.—A few birds noted.

Morganornis superciliosus (Vigors and Horsfield). White-throated Babbler.—These birds were numerous on the mainland. Upon comparing skins with the northern ones it is found there is little or no difference in colouration. The bill of the southern bird seems to be shorter, and not so curved, still the bill of the northern form varies at times. The measurements of these specimens taken—No. 1 ♂, length, 215 m.m.; wing from body to tip, 114 m.m.; spread of wings, 265 m.m. No. 2 ♀, length, 223 m.m.; stretch of wing from body to tip, 120 m.m.; spread of wings, 254 m.m. No. 3.—♂, length, 190 m.m.; wing from body to tip, 110 m.m.; spread of wings, 253 m.m.

Epthianura albifrons (Jardine and Selby). White-fronted Chat.—Great numbers of these birds were hunting diligently over the flats where the fresh water gravitates into the salt, when the tide came in they went back into the sandhills, and returned when the tide went out.

Acanthiza lineata (Gould, sub-sp?) Striated Tit.—A few birds observed in the scrub on the mainland. In comparing them with the Mount Lofty Range bird the bill is not so stout and more pointed, the brown on the forehead and the striations are almost absent, and the green on the back is not so pronounced. A ♂ measured—length, 100 m.m.; wing from body to tip, 63 m.m.; spread of wings, 153 m.m.

Geobasileus chrysorrhous (Quoy and Gaimard). Yellow-rumped Tit.—This bird agrees with the southern form, and G. M. Mathews is right in making the northern form a distinct sub. sp., for it is a brighter and larger bird. One specimen a ♂ measured—length, 108 m.m.; wing from body to tip, 84 m.m.; spread of wings, 285 m.m.

Sericornis longirostris wyldei (S. A. White.*). Coorong Scrub Wren.—These birds were very rare and shy, and it was only after many attempts that I was able to procure them, they keep to the lignum creeks, sing a low sweet song morning and evening, otherwise one would never know they live there, the type specimen measures—length, 120 m.m.; wing from body to tip, 75 m.m.; spread of wings, 170 m.m.

Maccoynornis broadbenti whitei (Mathews). Southern Rufous Bristle Bird.—There is quite a number of these birds scattered over the sandhills of Younghusband Peninsula. They were exceedingly shy and difficult to secure, darting

* "South Australian Ornithologist", Vol. II., page 169.

with lightening-like rapidity from one bush or clump of sword-grass to another. They seem to be perfectly silent during the day, but at sunrise and sunset they sing a most remarkably sweet song. The prelude is a loud ticking note, like the ticking of a clock, but loud and sharp, and after being repeated three or four times, they burst into a beautiful soft melody, which increases in volume then softly dies away. The song is taken up and carried on from one depression in the sandhills to another and lasts for about two minutes. With this exception the birds are silent without their hiding place is approached, then an alarm call is given of two notes, resembling very much the alarm call of some of the honey-eaters, but louder and shriller. They depend upon their feet to escape from danger, as a rule only once did I see a bird take to flight, and that was when I flushed it from a patch of sword-grass which stood out in the open. I found by experience that it is quite correct that these birds will run down a rabbit burrow till the danger is past, and have repeatedly tracked them down the burrows. They are extremely local birds, and if a pair be marked down in a clump of bushes or rushes they will be heard singing morning and evening at sunrise and at sunset, within thirty yards of first discovery.

Measurements of specimens taken—

No. 1. ♀ length, 253 m.m.; spread of wing from body to tip, 114 m.m.; spread of wings, 270 m.m. No. 4 ♂, length, 265 m.m.; spread of wing from body to tip, 113 m.m.; spread of wings, 278 m.m. No. 6 ♂, length, 273 m.m.; spread of wing from body to tip, 112 m.m.; spread of wings, 279 m.m. No. 01 ♀, length 253 m.m.; spread of wing from body to tip, 114 m.m.; spread of wings, 279 m.m.

No. 1 bill, 15 m.m.; tarsus, 34 m.m.; Iris, bright reddish-brown, top mandible, greyish-brown; lower mandible, light grey; feet, slaty brown.

No. 4. Iris, bright reddish-brown; top mandible, dark brown; lower, greyish brown.

No. 6, bill, 17 m.m.; tarsus, 33 m.m.

Colluricincla harmonica victoriæ (Mathews). Victorian Grey Shrike Thrush.—These birds were fairly numerous, and were found both in the sandhills and on the mainland. Upon comparison with skins taken round Adelaide, showed no variation.

No. 1 ♀ Length, 265 m.m.; spread of wing from body to tip, 164 m.m.; spread of wings, 381 m.m.. Iris, rich brown; bill, blackish brown; feet, slaty black.

No. 2. ♂, length, 265 m.m.; spread of wing from body to tip, 164 m.m.; spread of wings, 381 m.m. Iris, rich reddish-brown; bill and feet, black.

Bulestes torquatus ethelae (Mathews). Southern Butcher Bird.—A pair of these birds was so quiet in camp that they would take food from the hand.

Neositta pileata tenuirostris (Gould). Slender-billed Tree-runner.—A family of these charming little birds was met with in the sheoak country. One bird, a ♂ taken, measured—length, 126 m.m. Wing from body to tip, 70 m.m.; spread of wings, 158 m.m.

Melithreptus atricapillus (Latham). Brown-headed Honey-eater. Small parties were moving about from tree top to tree top on the mainland. One bird taken, ♂—length, 133 m.m.; wing from body to tip, 95 m.m.; spread of wings, 210 m.m.

Meliphaga sonora (Gould). Southern Singing Honey-eater. These birds were numerous on the mainland, and were occasionally seen in the sand dunes, two male birds were taken, which measured as follows. No. 1,—length, 203 m.m.; wing from body to tip, 127 m.m.; spread of wings, 298 m.m. No. 2—Length, 203 m.m.; wing, 127 m.m.; spread of wings, 293 m.m.

Meliornis novaehollandiae subassimilis (Mathews). South Australian White-bearded Honey-eater.—Numerous on the mainland, a ♂—length, 178 m.m.; wing, 105 m.m.; spread of wings, 241 m.m.

Myzantha melanocephala whitei (Mathews) Southern Black-headed Minah.—Numbers of these noisy birds were met with on the mainland, mostly in the scrub or open forest country, two specimens taken. No. 1. ♂—Length, 290 m.m.; wing from body to tip, 178 m.m.; spread of wings, 412 m.m. No. 2. ♂—Length, 280 m.m.; wing, 190 m.m.; spread of wings, 430 m.m.

Acanthagenys rufogularis cygnus (Mathews). Southern Spiny-Checked Honey-eater.—Fairly plentiful on the mainland, not seen on the sandhills between the Coorong and the sea. The specimen taken was a very dull bird, showing but little rufous on the throat, it was a ♂, and measured—length, 254 m.m.; wing from body to tip, 228 m.m.; spread of wings, 344 m.m.

Birds of the North and North-West of Australia.

From Skins and Notes made by the late Capt. T. H.
Bowyer-Bower.

BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., etc.
No. 14.

209. CONOPODERAS AUSTRALIS CARTERAE. Pale Long-billed
Warbler.

Acrocephalus australis carterae (Mathews). Nov. Zool.;
Vol. XVIII., p. 343, 1912. Derby, North-West Australia.
No. 255.—♀. Length, 6.7 (1/9/86).

Irides, hazel brown; bill, upper mandible, dark brown;
almost black at the base and shading off lighter towards the
point, and with a fine brownish flesh-coloured line along its
side near the cutting edge, lower fleshy white with a bluish
tint about half its length, which does not extend to the tip,
legs and feet, lead colour. They seem rare and are shy and
difficult to procure.

210. CISTICOLA EXILIS PARRYI. Western Grass Warbler.
Cisticola exilis parryi (Mathews). Austral., Av. Rec.,
Vol. I., p. 77, 1912. Parry's Creek, North-West Australia
No. 273.—Length, 4.5 inches (4/9/86).
No. 316. ♂—Length, 4.3 inches (27/7/86).
No. 318. ♀—Length, 4.5 inches (28/7/86).
No. 350.—Length, 4.8 inches (19/9/86).

226. LEGGEORNIS LAMBERTI MUNGI. North-Western Blue-
Breasted Wren.

Malurus lamberti mungi (Mathews). Nov. Zool., Vol.
XVIII., p. 360, 1912. Mungi, North-West Australia.
No. 342.—♂. Length, 5.4 inches (31/7/86).
No. 344.—♀. Length, 5.5 inches.
No. 391.—♂. Length, 5.4 inches (12/10/86).

Irides, brown; bill, black; tarsi, fleshy brown; feet, brown.

227. ROSINA CORONATA CORONATA Purple-crowned Wren.
Malurus coronatus (Gould). Proc. Zool. Soc. (Lond.) 1857,

p. 221, Victoria River, Northern Territory.

No. 218.—♂. Length (without the tail), 5. inches.
No. 220.—♂. Length, 5.7 inches (26/8/86).
Very plentiful, but somewhat difficult to obtain.
No. 238.—♀. Length, 6.1 inches (29/8/86).
No. 243.—♂. Length, 6.3 inches.
No. 244.—♂. Length, 6.2 inches (30/8/86).

Irides, brown; bill, black; legs and feet, brownish flesh colour.

- No. 254.—♀. Length, 6.1 inches (1/9/86).
- No. 266.—♂. Length, 5. inches.
- No. 268.—♀. Length, 5.8 inches (3/9/86).
- No. 272.—♂. Length, 6.1 inches (4/9/86).
- No. 276.—♀. Length, 5.5 inches (5/9/86).
- No. 282.—♀. Length, 5.9 inches (6/9/86).
- No. 287.—♂. Length, 5.9 inches (7/9/86).
- No. 292.—♂. Length, 6. inches (8/9/86).
- No. 293.—♀. Length, 5.6 inches (8/9/86).
- No. 302.—♂. Length, 6. inches (11/9/86).
- No. 303.—♂. Length, 6.3 inches (11/9/86).
- No. 304.—♀. Length, 5.7 inches (11/9/86).
- No. 334.—♂. Length, — inches (16/9/86).
- No. 338.—♂. Length, 6.2. inches (17/9/86)
- No. 352.—♀. Length, 6.5. inches (20/9/86).
- No. 354.—♀. Length, 5.8 inches (20/9/86).
- No. 372.—♂. Length, 5.9 inches (27/9/86).
- No. 373.—♂. Length, 5.9 inches (27/9/86).
- No. 373.—♀. Length, 5.6 inches (27/9/86).
- No. 408.—♂. Length, 5.7 inches (17/10/86).
- No. 430.—♀. Length, 5.9 inches (24/10/86).
- No. 432.—♂. Length, 6.4 inches (24/10/86).
- No,—♂. Length, 6.4 inches (24/10/86).
- No. 463.—♀. Length 6. inches (28/10/86).
- No. 466.—♂. Length, 6.4 inches (28/10/86)
- No. 471.—♂. Length, 6. inches (28/10/86).
- No. 477.—♀. Length, 5.4 inches (29/10/86).
- No. 478.—♂. Length, 6.3 inches (29/10/86)
- No. 529.—♂. Length, 6. inches (8/11/86).
- No. 530.—♀. Length, 5.8 inches (8/11/86)

These birds are found in a bamboo-like growth, sometimes many yards from the riverside. They are always driving away *Ryania melanoccephala boweri*. They are very inquisitive, the females coming within two or three yards of one. The all have the power of raising the feathers of the crown of the head, which greatly increases the apparent size of that part. The female always seems to lead the parties or families and they are never far from the water's edge. While moving along they constantly utter a call "chirripp," which seems to be repeated by each member. The number of these parties varies from 5 to 7. The tail is carried much like *Malurus*, but not so far over the back. They often take in-

sects on the wing, but appear to live on larger ones than *Ryania*. The male is shy when in adult plumage, but he is truly a lovely bird, and the colours of the head show out in the light to a remarkable extent. They have no song, and the "chirripp" uttered while moving along in flocks is far stronger and easily recognised from that of *Ryania*. They always select long rushes or bamboos, up the stems of which they climb with ease; they also feed more on the wing than *Ryania*.

228. *RYANIA MELANOCEPHALA BOWERI*. Western Red-backed Wren.

Malurus cruentatus boweri (Ramsay). Proc. Lenn. Soc., N.S.W., Ser. II. Vol. II., 1886, p. 1100, 11887 Derby, North-West Australia

No. 303.— . Length, 9.9 (22/7/86).

Irides, brown; bill, very dark brown; becoming horn colour for a short space in front of the nostrils, and on the sides of the lower mandible; legs and toe, slate.

No. 398.— ♀. Length, 9.5 inches (13/10/86).

Irides, reddish-brown; bill, whitish-brown, darker in the culmen at the tip and round the nostrils; legs and feet, bluish-lead.

No. 402.— ♂. Length, 10. inches (13/10/86).

Irides, reddish-brown; eyelid, lead; bill, black; legs and feet, slate.

No. 443.— ♂. Length 10. inches (26/10/86).

Irides, fine brown; bill, black; legs and feet, lead.

No. 496.— ♂. Length, 9.5 inches (3/11/86).

Irides, brown, with a reddish tint; bill, black; tarsi and feet, lead; the former tinged with olive.

No. 213.— ♂. Length, 4.3 inches (1/7/86).

No. 233.— ♂. Length, 4.3 inches (29/8/86).

No. 257.— ♂. Length, 5.2 inches (2/9/86).

No. 259.— . Length, 4.8 inches (2/9/86).

No. 301.— ♂. Length, 4.5 inches (21/7/86)

Irides, brown; bill, black; legs and feet, flesh colour.

No. 314.— ♂. Length, 4.2 inches (26/7/86).

No. 315.— ♀. Length, — inches (26/7/86).

No. 335.— ♂. Length, 4.5 inches (30/7/86).

No. 353.— ♀. Length, 4.3 inches (21/9/86).

No. 381.— ♂. Length, 4.3 inches (7/8/86).

No. 415.— ♂. Length. 4.5 inches (20/10/86).

No. 419.— ♂. Length, 4.4 inches (21/10/86).

No. 485.— ♂. Length, 4.4 inches (2/11/86).

No. 489.— ♂. Length, 4.4 inches (2/11/86).

No. 490.—♂. Length, 4.3 inches (2/11/86).

No. 493.—♂. Length, 4.4 inches (2/11/86).

No. 503.—♂. Length, 4.2 inches (3/11/86).

234. ARTAMUS LEUCORHYNCHUS HARTERTI. Western White-rumped Wood Swallow.

Artamus leucorhynchus harterti (Mathews). Nov. Zool., Vol. XVIII., p. 367, 1912. Parry's Creek, North-West Australia.

No. 246.—♂. Length, 7.1 inches (31/8/86).

No. 247.—♀. (31/8/86).

Irides, brown; bill, delicate light bluish slate, becoming black at the tip; legs and feet, mealy black.

234. CAMPBELLORNIS PERSONATUS GRACILIS. Northern Masked Wood Swallow.

Artamus gracilis (Ingram), Bull. Brit. Ornith. Club, Vol. p. 115, 1906, Alexandra Northern Territory.

219.—♂. Length, 8.1 inches (5/7/86).

Irides, fine brown; bill, beautiful blue or lavender at the base, becoming black at the tip; legs and feet, black with a bluish tinge.

No. 220.—♀. Length, 7.8 inches (5/7/86).

No. 221.—♂. Length, 8.2 inches (5/7/86).

No. 223.—♀. Length, 7.7 inches (5/7/86).

No. 224.—♀. Length, 7.6 inches (5/7/86).

No. 259.—♀. Length, 8. inches (16/7/86).

Legs and feet, nearly lead colour.

No. 260.—♀. Length, 7.8 inches (16/7/86).

No. 261.—♂ and No. 262. ♂. Length, 7.9 inches (16/7/86).

No. 319.—♀. Length 7.5 inches (28/7/86).

No. 320.—♂. Length, 7.8 inches (28/7/86).

No. 321.—♂. Length, 8. inches (28/7/86).

No. 322.—♂. Length, 8.2 inches (28/7/86).

No. 323.—♂. Length, 8.2 inches (28/7/86).

No. 326.—♀ and No. 327.—♂. (28/7/86).

Common on the red flowering gum trees, all their heads and throats being covered with the pollen of the flowers. Their note greatly resembles that of the Common House Sparrow (*Passer domesticus*), and they are a noisy bird. When flying they are graceful in the wing, and very swallow-like in their movements, keeping at a great height, sometimes almost out of sight, but still uttering their single note.

235. *CAMBELLORNIS SUPERCILIOSUS PHAEUS.* Northern White-browed Wood Swallow.

Artamus phaeus (Ingram), Bull. Brit. Ornith. Club., Vol. XVI., p. 115, 1906. Alexandra, Northern Territory.

No. 295.—♂. Length, 7.7 inches (20/7/86).

No. 296.—♀. Length, 7.9 inches (20/7/86).

Bill, beautiful light bluish slate for a little more than half its length, remainder, black; legs and feet, black.

No. 308.—♂. Length, 8.1 inches (24/7/86).

No. 376.—♂. Length, 8 inches (6/8/86).

No. 377.—♀. Length, 7.7 (6/8/86).

235. *AUSTRARTAMUS MELANOPS VENUSTUS.* White-vented Wood Swallow.

Ariamus venustus. Sharpe in Rowley's Ornith. Miscel., Vol. III., p. 198, 11878. North-West Australia.

No. 26.—♂. Length, 7.4 inches.

Irides, dark brown; bill, lavender, tip nearly black; legs, bluish grey.

No. 29.—♀. Length, 7.7 inches (29/5/86).

No. 30.—♂. Length, 7.7 inches (29/5/86).

No. 99.—♀. Length, 7. inches (5/6/86).

No. 102.—♂. Length, 7.5 inches (5/6/86).

No. 103.—♀. Length, 7.5 inches (5/6/86).

This bird was seen gathering together for the night like a swarm of bees, clinging to one another in a bunch suspended from a bough.

236. *MICRARTAMUS MINOR DERBYI.* Northern Little Wood Swallow.

Artamus minor derbyi (Mathews). Nov. Zool., Vol. XVIII., p. 368, 1912. Derby, North-West Australia.

No. 161.—♀. Length, 5.6 inches (21/6/86).

Irides, brown; upper mandible, lavender; tip, black; tip of lower and a stripe from the tip to the chin, black; legs and feet, black.

No. 162.—♀. Length, 5.7 inches (21/6/86).

No. 163.—. Length, 5.7 inches (21/6/86).

No. 184.—♂. Length, 5.6 inches (26/6/86).

No. 505.—♀. Length, 5.8 inches (4/11/86).

This species is decidedly more swallow-like in its movements than "*venustus*" and does not resort so much to trees.

240. *CALEYA MEGALHYNCHIA GRISEATA.* Minute Shrike Thrush.

Myiolestes griseatus (Gray). Proc. Zool. Soc. (Lond.), 1858, p. 180. Cape York, Thursday Island, Cape York.

No. 21.—♂ (4/5/86).

241. GRALLINA CYANOLEUCA NEGLECTA. Little Magpie Lark.
Grallina cyanoleuca neglecta (Mathews). Nov. Zool., Vol. XVIII., p. 372, 1912. Parry's Creek, North-West Australia.
 No. 337.—♂. Length, 11.3 inches (30/7/86).

Pretty and graceful birds, generally seen in pairs (male and female.) Their note is peculiar, at each note the male raises his wings.

243. CRACTICUS NIGRO-GULARIS TORMENTI. Western Pied Butcher Bird.

Cracticus nigrogularis tormenti (Mathews). Austr. Av. Rec., Vol. I., p. 46, 1912. Napier Broom Bay, North-West Australia.

No. 495.—♂. Length, 13.8 inches (3/11/86).

Irides, very dark brown; bill, bluish or steel-white for the basal two thirds, apical third, black; tarsi, olive brown, but where the scales are off, bluish-lead; feet, bluish-lead.

This is certainly a King of Songsters, and as soon as the first dawn appears, his clear notes ring out, for the rest of the day he appears to be silent.

249. NEOSITTA PILEATA NAPIERA. Western White-winged Tree-runner.

Neositta pileata Napiera (Mathews). Austral. Av. Rec., Vol. II., p. 68, 1913. Napier Broome Bay, North-West Australia.

No. 48.—♂. Length, 4.5 inches (26/5/86).

Irides, light brown, becoming darker towards the pupil, eyelids, greenish white; bill, black; basal half greenish white; legs, dull yellow.

They fly from one tree to another, and while flying they call in a single note. Unlike "*chrysoptera*" they do not fly to the trunk of the tree, and work upwards, but to the high branches, and after running round the bark generally, went to the flowers, where they obtain insects.

238. COLLURICINCLA BRUNNEA ROEBUCKI. Little Brown Shrike Thrush.

Colluricincla brunnea roebucki (Mathews). Austral. Av. Rec., Vol. I., p. 94, 1912. Roebuck Bay, North-West Australia.

No. 268.—♀. Length, 7.9 inches.

Irides, brown; bill, with the extreme tip and culmen, brown; sides, very light brown, shading towards white towards the tip; legs and feet, bluish lead colour; claws, brown.

No. 294.—♂. Length, 9.6 inches (20/7/86).

Bill, dark brown, almost black.

No. 50.—♂. Length, 4.4 inches (27/5/86).

Irides, reddish-brown; eyelids, greenish-yellow; bill, greenish-yellow; tip, black; legs, yellow.

No. 51.—♀. Length, 4.5 inches (27/5/86).

No. 52.—♂. Length, 4.5 inches (27/5/86).

No. 58.—♂. Length, 4.5 inches (28/5/86).

No. 63.—. Length, 4.5 inches (29/5/86).

No. 504.—♀. Length, 4.5 inches (3/11/86).

Irides, light brown; bill, yellow, with black tips; legs, yellow; bill, yellow; tip, black; legs and feet, yellow.

Irides and eyelid, greenish-white; bill, brown, with the base of the lower mandible, white; and gape and basal third of cutting edges of both mandibles, pale yellow; legs and feet, pale yellow.

No. 510.—♂. Length, 4.7 inches (4/11/86).

Another New Record for South Australia.

(By F. R. Zeitz, R.A.O.U.)

—Contribution from the S.A. Museum.—

Mr. J. Formby, a resident of Mylor called at my office about the middle of January of this year, and described two strange birds to me, which had recently made their appearance in that district. As there are many extensive orchards in that neighbourhood it was feared that these birds might take to fruit-eating, and perhaps be the forerunners of a new pest for the oehardists. According to the vague description given, I showed Mr. Formby the Australian Dollar Bird, but as he could not satisfy himself that it was identical with the birds he had seen, he shot one of them and forwarded it to the Museum for identification. It proved to be a very young male of the Australian Dollar Bird or Roller (*Eurystomus orientalis pacificus*) heavily in moult. It is paler and more bluish below than Queensland and N.S. Wales specimens, which character may be due to immaturity.

The Museum Entomologist (Mr. A. M. Lea) examined the stomach contents of which he reports as follows.—Head and other fragments of Stag Beetle (*Lamprima varians*); bits of two large Stag Beetles (*Tetralobus*); bits of large Clerid Beetle (*Trogodendron fasciculatum*); head of a large Ponerine Ant; head of a Sand Wasp; many other fragments, mostly of beetles.

This record gives this species a still greater range, as it was previously recorded from India, N.W. Australia, Northern Territory, Queensland, N.S. Wales, and Victoria.

Notes from Humbug Scrub for November, 1917.

By T. P. Bellchambers.

Tachybaptus ruficollis novaehollandiae. Black-throated Grebe. One bird paid occasional visits to the dam.

Austroturnix velox. Eastern Little Quail.—Several nests observed, one in the herbs, one in the hay crop, only seen after crop was cut, and contained four eggs. As soon as the cover was cut away the birds constructed a neat cover over the nest.

Pseudartamus cyanopterus. Wood Swallow.—Numerous in the district this season, and considered harmful to the bee industry. I experimented with one of these birds in captivity, and found it refused all worker bees, only eating drones, thus proving beneficial and not harmful to beekeepers, drones always being in excess of requirements.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

By His Son, S. A. White, M.B.O.U.

XVI. THE ORNITHOLOGIST AND SAILOR.

No great Birds of Paradise came in on Monday, July 26th, but the natives brought along about twenty other birds of several species, a cuscus and several rats. My father and both his taxidermists were now suffering very much from the effects of arsenic and arsenate of potash in the skin curative, "Arsenical soap." My father always prepared his own soap for this purpose, and made it doubly strong. When this preparation works down under the finger nails and especially the thumb nails, it separates the flesh from the nail, and keeps it in a constant state of festering. Often the irritation reaches three fourths of the distance down the nail, and if the ends of the fingers come in contact with anything hard, it makes one cry out with pain. I have experienced this myself, so it can be understood how the great Naturalist and his assistants suffered when they had to skin and cure hundreds of specimens in a week. The weather was showery during the 26th, little if any wind was perceptible. The next morning Cockrell was sent out with the gun to see what he could get. One

of the crew landed him and came back with the boat. My father and Andrews remained on board to barter with the natives, and cure the specimens, but they had far too much to do for the natives came in with a good number of birds, amongst these some great birds of Paradise, and two "Goby, Goby's" (*Paradisea regia*). The great birds were not all fully plumed, some were young males and others females. Cockerell returned with several birds, one a large Manucode or fruit crow. In some brief notes my father wrote on that day. "The natives have been coming and going all day, and my patience has been put to a severe trial, these fellows are so persistent, and so troublesome, and it will not do to fall out with them, as they may then not come at all, it is amusing to see some of them when they bring a "Buring Matti" (Great Bird of Paradise) for sale.

They know not what to ask, but will sit or stand for the first hour and refuse all offers, then perhaps they will name over a long list of things required, then alter their minds and name over another list, "Sopie," (spirits) often included, thus they remain to my great annoyance blocking up every inch of space to such an extent that we cannot move. I have had too much of them to-day, the skinning room has been full all day, and my dusky visitors have been talking incessantly, and at the top of their voices, making so much noise that we cannot hear ourselves speak. This afternoon a good number of beetles came in, bugs tied up in leaves, caterpillars and beetles tied in green leaves, large longicorns with their legs tied up to keep them from running away, or tied in bunches by the antennae.

This evening for the first time a quantity of sweet potatoes was brought on board (about half a bushel), and I purchased them for ten times their value. A man came off this afternoon with two Great Birds of Paradise in such a state of putrefaction that their feathers were falling off them, and these birds are very far gone when the feathers come off, for I have frequently skinned them when they were quite green, and full of maggots, and the skin is exceedingly tough, and the feathers well set. These two birds had been rolled in ashes to absorb the moisture which was coming out through the feathers, and their beautiful plumes were soiled from end to end. The fellow must have kept them a week or more. He was very persistent in asking for guns, and seemed hardly to realise the fact that the birds were useless. He had possibly been out in the scrub for weeks—perhaps covered in

boughs and perched in a tree awaiting for the "Great Birds" to come to feed in the tree, when he would be prepared to shoot them with his bow and arrows. Samuel White writes in his notebook under heading of 28th July:—"We have been skinning all day, but there was a great falling off in the quantity of things brought in by the natives. I skinned nine Birds of Paradise to-day, which were in all stages of plumage from full to no plumes at all. They are chocolate colour of different tints all over, and often quite destitute of plumes. I have gone in to-day for ethnological specimens a good deal.

A variety of things were brought and offered, but everything is very dear, the natives know not how to ask enough. To-morrow I shall go over on the Wokan side to try for some flies, as I think it is a good place." Then again on the 29th he wrote:—"This morning at sunrise I had a boat swung out. Two of the crew with Cockerell and myself started to ascend the creek on the Wokan side of the Watalli Channel. This creek I call Cockerell's creek, because Cockerell was the first of our party who ascended it. I took provision for two days, a fly net, boxes, pins, bottles, etc., but no gun, for I intended giving up all my time to insects and leaving Cockerell to look after the birds. We crossed in the boat, and down the Watalli Channell about $1\frac{1}{2}$ miles, when we arrived at the mouth of the creek running in on the Wokan side, it enters in a northerly direction, and winds about for the distance of about a mile, through a densely-wooded and picturesque country, the banks on either side were rocky and thickly covered with beautiful and varied vegetation. It was early morning, and although the day was a cloudy one and the sky threatening the picture around us was very beautiful. The calls of many birds were heard as is usual at early morn in the tropical scrubs and forests, and amongst others we heard the loud "Wark, Wark" of the Great Bird of Paradise.

After we had rowed about a mile in this creek in salt water, our progress was suddenly ended by a huge reef across the creek, about four feet out of high water, here the salt-water ceased, and fresh water runs into it during rains. We now left the boat which I sent off to the yacht, with orders to meet us in the morning of the next day at the same place. My companion and I walked up the creek for about four miles, through fresh water varying in depth from ankle deep to up to our waists. The bottom of the creek for the whole distance is bare rock (Coraline limestone) the water had ceased

to flow, or almost so, and it lay in long pools varying in depth from a few inches to three or four feet. After wading up the creek for about four miles we were nearly at its source in the centre of the island of Wokan. The land although very undulating, rough and rugged is very low, the only rises I could perceive as we walked up the creek, being a few ledges of rock over which the rain water tumbles and there rises averaged about a foot high, and occurred several times in a mile. The bottom of the creek was bare rock, without mud or sand. At the source of the creek is a native plantation, where they have made a partial clearing, and were growing a variety of plants for food. It was here I was expecting to find numbers of insects, and long before we reached the spot rain began to fall, and continued at short intervals all day. It was a poor day for anything, and I only captured about a dozen flies, besides a few beetles.

As the weather was so wet we decided not to stay the night, but to return to the village a little below where we entered the creek and try to get a canoe to take us off to the Yacht, as I had told the men not to come off for us till next day. Cockerell shot a few good birds. Little could be done in the wet, and I could take more flies in Australia in an hour than here in a day. On our return I captured several interesting flies, and Cockerell procured several beautiful little Kingfishers, with bright-blue backs and yellow breasts.

Upon arriving at the village which is composed of one large house, it was not difficult to persuade one of the men to take us in his canoe to the Yacht, and be it said to the credit of the natives generally, that they were always willing to render me assistance of this kind when I have been benighted or astray among them. They of course always expected to be rewarded with a little tobacco or some other thing, and I never failed to pay them liberally. We reached the yacht wet and cold about dark, and I was glad I had returned as there were no less than eleven Birds of Paradise to be purchased, these were not all plumed of course, but a fair proportion had plumes, to barter for all these kept me vigorously at work till just on midnight, the guns were all gone, but the breech loaders, and these had to be shown to prove there was not a muzzle loader left, then the birds had to be purchased with a variety of things such as powder, shot, beads, axes, knives, calico, handkerchiefs, iron wire, and sovereigns such bartering I never experienced before. The trading will begin by asking for tens or fives of everything, and reduce the

numbers as business progresses, during all this time the cabin of my little craft is filled with men so full that no one can move, the heat is very oppressive, all talking at once and at the top of their voices. This goes on hour after hour, and after I have had a fatiguing day's walk in a tropical scrub, it requires all the patience I possess to keep me from losing my temper, but I am determined not to show anger at any trifling annoyance, as these people do not mean to be offensive.

So this evening I concluded our bargains, and we parted if not quietly (for these people are excessively boisterous) we did so with satisfaction on both sides. A number of things were purchased such as, birds, insects, shells, baskets, implements, etc. A young cassowary that was offered I could not buy as the owner would be satisfied with nothing but "Sopie" (Grog.) I am frequently asked for spirits, but I do not mean that they shall have a drop of it, as it is a useless and dangerous luxury. that they can well do without. I have suffered exceedingly all day to-day with chafed flesh. It frequently happens that persons in these warm climates have their flesh break out into a rash, prickly heat, etc, especially in the over-heated parts, such as under the arms, round the waist, inside the thighs, etc. Mine seems on the inside of the thighs, and the desire to scratch is irresistible, and our hands being continually in arsenic the skin may have become poisoned. However my flesh has broken out into festering sores. I am not the only one, for those who have to go out and do as I do are as bad, and the wet to-day and chafe of our wet clothing has made Cockerell and myself perfectly raw, and it is with difficulty we can get about, indeed if it gets much worse we will be laid up.'

The next day the 30th, my father remained on board all day for he and his two taxidermists were very busy curing specimens. Several Birds of Paradise were brought on board, and many other birds and natural history specimens were bartered for, but my father seems to have been suffering very acutely with his flesh sores aggravated so by his wet trip inland.

In a very brief note written on that day by my father he says:—"About 10 o'clock this morning a Macassar man came with a Bird of Paradise and is here still (midnight) he expected a gun for it, but my muzzle-loading guns are all gone, and the fellow cannot realize the fact. The day has passed as usual—crowds of natives filled the ship. I have not been too tolerant with them to-day I have been a good deal

out of temper, having suffered all night, and to-day very much with my sores, the wetting yesterday has not done them any good. Rain has been falling all day." The man referred to in the above note remained on till the morning when my father tried all kinds of ways to get rid of him or purchase the bird, but to no purpose the fellow wanted a gun and was fearfully disappointed about not getting one, as last when he found that the owner was leaving his ship he accepted a sovereign and a variety of other things. These other Malays are the worst class of men to deal with for they will remain or come back day after day and renew their bartering. The Aru men are quite bad enough in their persistent ways, but the Macassar and Malay men are far worse. As soon as my father got rid of all the natives on board he ordered out the big boat and a crew, and made up the Watalli Channel, a light breeze sprang up, and a sail was hoisted, but after a mile or so it died away and they resumed pulling, which was continued for four hours and arrived within a few miles of the end of the channel. When the tide changed and became too strong, and he had to turn back owing to the wet, and not having a tent with them. In some notes written some time afterwards, my father says: "The channel did not turn suddenly to the north-west as I expected it might, but kept in an easterly and north-easterly direction, the bends were not excessive although not straight anywhere.

After we left the yacht a few miles behind, the channel became a little narrower, (about 400 yards in the narrowest place). The scenery was exceedingly beautiful as we passed along, the channel looked like a broad and noble river, the tide-like stream running at the rate of two or three miles an hour. The banks in some places were perpendicular rock, and in others low and muddy, the land on either side was low, very uneven, indeed rugged, and densely clothed with luxurious vegetation of many species, amongst it here and there a cocoanut struggled through and showed its head amongst the rest of the vegetation. The very edge of the cliff grew thick scrub, and trees at times grew on the bare face of the cliff, spreading their roots and grasping every inequality of surface or every hole in the rock. During the first four miles we passed about a dozen houses of the natives, generally not more than one at one spot placed on the points of land that jut out into the water here and there, and where the soil on the rock is a little deeper than usual, here the natives half clear the land, and plant their food stuffs, the houses are built in

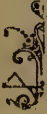
the usual way on piles, thatched with palm leaves, and the sides formed with mats. One man was building a new house alongside the old one, it was not very extensive, but must have been nearly 30 feet long, it had two raised floors, which were about seven feet apart, the first floor being about that distance from the ground. We passed many tributaries to the Watalli Channel like the Wanumbi creek, but most were shallow and shot off from the main stream on either side. Although I did not reach as far as I desired I was gratified and much pleased with the scenery, I consider it extremely beautiful, and am sure if it were within reach of civilized parts of the world it would be much frequented. In many places we observed fresh water falling over rocky banks into the salt water of the channel at such places we frequently landed after an hour of so's pull in the sun (as the sun shone out very warm between the showers), and my men refreshed themselves with cool clear water, which comes from the dark dense tropical scrub and falls in cascades into rocky basins before it finally mingles with the water of the ocean.

We reached the yacht before dark, and I felt as though I had ended a good days work, but far worse than all the work are the sores that are increasing both in size and number in places about my body. When warm and the perspiration is running, the horrible itching and smarting at times seems almost as much as I can endure, several times to-day I have been on the point of jumping overboard to wash away the perspiration, but am afraid the salt water may aggravate the wounds. There were a great many natives on board when I got back, but they bring but little now. The weather to-day has been very disagreeable, being both hot and wet."

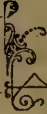
August 1st, my father gave orders to have the yacht shifted with the ebb tide, and at ten o'clock she was under way, and came out of the Watalli Channel. There were several natives on board when the anchor was heaved, one had a live Bird of Paradise tied by the leg to a stick, it was a fine bird, five or six years old, perfect all but the side plumes, these were only a few inches long, and of a very dull straw colour. The poor bird fluttered, bit, and screamed, the owner refused several axes for it, and took it away as the yacht got under way, he either did not know what he wanted for it, or could not explain. My father, writing under the above date, says: "We came out of the channel with both the wind and tide, and were soon in the big open bay at the mouth of the Watalli Channel, here I intended dropping anchor, but I was busy be-

low, and the Captain disobeyed my orders in not calling me. He went on to the north-west point of the bay, I fear it is too far to return, or I would have liked to settle the doubt as to there being a passage for a boat from the Watalli Channel to the village of Maykor, but I think it very doubtful. We dropped anchor early in the afternoon, and most of the men went on shore. The weather was much finer than yesterday."





W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.





J. H. Riley

Vol. III.

Part 7.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st JULY, 1918.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.
A. G. EDQUIST
S. A. WHITE, C.M.B.O.U.
F. R. ZIETZ, R.A.O.U..

Price, 2/-

THE

South Australian

ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. G. EDQUIST

S. A. WHITE, C.M.B.O.U.

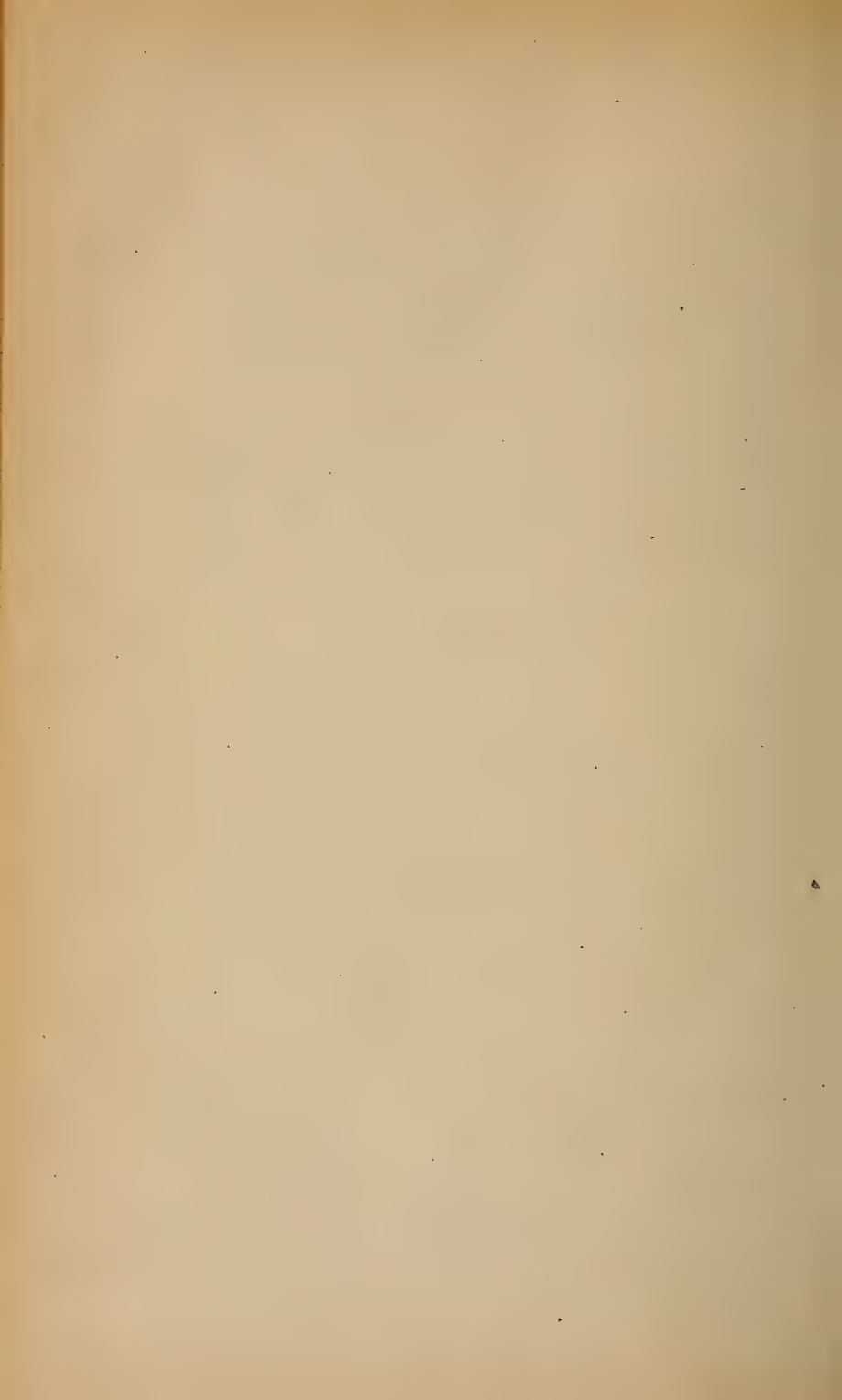
F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL, R.A.O.U.,

c/o W. D. & H. O. Wills, Ltd.,

Grenfell Street, Adelaide.



CONTENTS.

	PAGE
The South Australian Ornithological Association	193
Order Passeriformes, Family Meliphagidae, Genus Anthochaera . .	196
A Visit to the Breeding Grounds of Swan and Pelican on the Coorong. Capt. S. A. White, C.M.B.O.U.	198
Some Observations on the Nesting and the Young of Cormorants. A. M. Morgan, M.B., Ch.B.	201
Birds of the North and North-West of Australia (No. 15). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	205
About Members	209
Distribution of Lalage Tricolor	210
Living <i>versus</i> Dead Names for Australian Birds. A. J. Campbell, C.M.B.O.U.	211
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, Capt. S. A. White, C.M.B.O.U.	212

The Editorial Committee accepts no responsibility for the views or deductions expressed by any of its contributors. The Journal welcomes a free interchange of ideas with the object of extending the knowledge of our avifauna, but the author of each article is responsible for the opinions and deductions recorded.

— THE —

South Australian Ornithologist.

VOL. III.]

1st JULY, 1918.

[PART 7.

The South Australian Ornithological Association.

MONTHLY PROCEEDINGS.

—April 5th, 1918.—

Nineteenth Annual Meeting, Mr. A. G. Edquist in the chair. Election of office-bearers.—President, Capt. S. A. White; Vice-President, Mr. E. Ashby; Hon. Secretary, Mr. R. Crompton (on active service); Acting Hon. Secretary, Mr. F. M. Angel. The election of Editorial Committee was deferred until next meeting. Some notes were supplied upon bird-life at Humbug Scrub by Mr. T. P. Bellchambers. Capt. White gave a report of his official visit of inspection to the islands in the Coorong, and spoke of the kindness and assistance given by that keen Nature lover, and bird protector, Mr. Thos. McCallum, of McGrath's Flat, also by the energetic police officer in charge of the district, M.C. Kaine, who is doing his best to see that the Bird Protection Act is carried out. The speaker gave a description of the islands, and the nesting haunts of the birds, and reported that the birds had increased well this season, the only check was that a number of young pelicans had died through the parent birds being destroyed when in search of food, and on their way back to their young.

The speaker said that large painted notice boards, stating that no one without a permit could land on the bird sanctuary, were wanted in place of the calico notices hitherto used. It was resolved to carry this recommendation into effect. A debate took place in reference to the publication of the

Association's Journal, "The S.A. Ornithologist", and a decision was deferred till next meeting. A discussion was entered upon the validity of a new sub-species of *Platycercus adalaidae*, some remarkably bright specimens were tabled by Mr. Frank Parsons, and by Mr. E. Ashby. It was decided to adjourn the discussion to a future time, when other members would submit more material.

APRIL 26th, 1918.

Capt. S. A. White presided over a very large attendance. Miss Edwards, the first lady member of the Association was elected, Mr. A. G. Edquist was chosen to be a member of the publishing Committee in place of Dr. A. M. Morgan, resigned. A motion was carried by acclamation that Dr. Morgan's splendid work, while on the Committee be recorded. The Chairman referred to the death in Tasmania of Col. Legge, R.A., C.M.B.O.U., and said how much ornithology had gained by his services, and the great loss it had sustained by his demise. Many bird notes were recorded, Mr. J. W. Mellor reported having seen on April 4th a young Pallid Cuckoo, being mobbed by the common "greenies," and a wagtail. Mr. E. Ashby notified that he had seen the White-throated Nightjar (*Eurostopodus mystacalis*), this being a record for Blackwood. The same member reported the presence of the Red-capped Robin (*Whiteornis goodenovi*) at Coromandel Valley (which is very unusual if not unique), and that the Spiny-cheeked Honey-eater (*Acanthagenys rufogularis cygnus*) had been seen on LeFevre's Peninsula. Several records of the first appearance for the season of the Flame-breasted Robin (*Littlera chrysoptera phoenicea*) were made. Mr. F. Parsons had noticed it at King's Park, Mr. T. Souther some time ago at Gilberton, and the Chairman at Tapley's Hill on April 19th. Mr. Lienau stated that the tree martins lately had been congregating in numbers on telephone and telegraph wires in the suburbs. The Chairman announced that nearly all the male *Maluri* (Wrens) were still in their brown plumage. Only one out of many had retained its nuptial dress. Autumn was the season when many birds seemed to be on the move, and it was at this time several species came down from the ranges to the plains such as the Rufous-breasted Thickhead (*Pachycephala rufiventris*), Black-faced Cuckoo Shrike (*Coracina novaehollandiae melanops*), Spiny-cheeked Honey-eater (*Acanthagenys rufogularis cygnus*), Spotted Diamond Bird (*Pardalotus punctatus*), and the Adelaide Rosella (*Platycercus elegans*

adelaidae), and the White-eye (*Zosterops lateralis*). The latter become more numerous, and the buff markings on the flanks become more pronounced. The Chairman also remarked that Mr. Osborn, who had much experience with birds in captivity, made a statement that he had seen, without doubt, a pair of Painted Finches on his farm at Pinnaroo a few weeks back. The remainder of the evening was devoted to a discussion on the validity of a new subspecies of *Platycercus adelaidae*, lately described by Mr. E. Ashby from Cape Jervis. Considerable material was tabled, including a fine series from the museum collection, shown by the Ornithologist (Mr. F. R. Zietz), and by Messrs. Ashby, Parsons, and Mellor, and the Chairman, from their private collections. Mr. W. Weidenbach exhibited two Painted Finches (*Emblema picta ethelae*), and a Honey-eater from the MacDonnell Ranges.

MAY 31st, 1918.

Capt. S. A. White presided. The Hon. Secretary (Mr. F. M. Angel) stated that in company with the Chairman he had waited upon the Minister of Industry in reference to bird protection, and the Minister had promised to do all he could in the matter. A letter was read from Mounted Constable L. Jury of Edithburg, stating that he wished to become a member, and expressing his great appreciation of the Nature Notes published in "The Register." The Chairman was congratulated upon the distinguished ornithological honour conferred upon him by the British Ornithologists' Union. Mr. Alfred Crompton stated that he had received a letter from his brother Robert (on active service) in which he gave an account of a few days furlough, which was spent in Paris, during which time he visited several museums; he was treated with the greatest courtesy, and was shown Baudin's and Peron's specimens from Australia, among them the extinct Kangaroo Island Emu, the only existing specimen. Mention was made of the death of Mr. M. E. Saunders, and the Chairman made feeling remarks regarding the loss the Association and Ornithology in general had suffered in the demise of the young and promising member. It was decided that a letter of condolence be sent to the relatives. Many bird observations were recorded. Mr. F. Parsons stated that he had seen the Grass Parrot (*Neonanoes elegans*) in numbers at St. Kilda lately, and that he had seen the Red-capped Robin near the City. Mr. J. W. Mellor reported having seen the Flame-breasted Robin at both Fulham and Lockleys, also the Black-faced Cuckoo-

Shrike. Mr. Samuel Sanders stated that during a recent trip to the Murray he had seen about 50 Wedge-tailed Eagles. They all settled on the ground, and covered about an acre. They danced and hopped about for a time, then all rose up and circled to a great height. Two new members were proposed—M.C. L. Jury and Mr. Ifould. The Chairman then read many extracts from letters received from observers in many parts of the State, which were most interesting. The birds under discussion for the evening were sombre coloured little tits whose presence is hardly noticed as they move about among the trees and bushes ever in search of insects. Those skins under notice were:—*Acanthiza pusilla* from New South Wales, *A. pusilla macularia* from Victoria, *A. p. archibaldi* from King Island, *A. p. diemenensis* from Tasmania, *A. p. zietzi* from Kangaroo Island, *A. p. hamiltoni* from the mallee districts, *A. p. arno* from Eyre's Peninsula, *A. p. consobrina* from the interior of South Australia. Specimens of the above were exhibited by Capt. White, Mr. F. Parsons, and Mr. J. W. Mellor.

Order Passeriformes, Family Meliphagidae, Genus *Anthochaera*.

Anthochaera chrysoptera intermedia (Brush Wattle Bird).

Description.—Male primaries, greater part of basic end of the inner webs, rufous; outer webs and remaining half of inner webs, dark brown, tipped with white; upper surface, blackish brown, each feather having a thin line of white down the centre; tail and wing coverts, blackish brown, tipped with white; tail, dark brown, tipped with white; all the feathers of the throat and chest, very dark brown, almost black, and terminating in hair-like tips which are white; under surface, blackish brown, each feather having a broad white line down the centre; iris, brown; feet and legs, reddish brown; bill, black.

Measurements.—Total length of dry skin, 270 m.m.; wing, 140 m.m.; bill, 25 m.m.; tarsus, 30 m.m.

The only difference between the sexes may be the slightly smaller size of the female.

The young take the adult plumage from the nest.

Distribution.—Found over South Queensland, New South Wales, Victoria, Tasmania, South Australia, Kangaroo Island.

The birds found in Queensland and New South Wales, those from Tasmania, and those found on Kangaroo Island, have been separated into three sub-specific forms, while those found in Victoria and South Australia (to which the above description pertains) forms the fourth sub-species. This may or may not be correct, there being little variation between them. The West Australian bird *A. c. lunulata* being very distinct.

Habits.—Noisy, conspicuous birds, which often visit the gardens in the suburbs. They are as a rule found in the bush or scrub, and seldom seen in thinly timbered country. Occasionally they are to be found in situations where heath and low *Banksia* grow. Common birds in many parts of the Mount Lofty Ranges, and once found in numbers upon the Adelaide Plains, in the days when thick scrub including *Banksia* covered a great deal of that country. Within the last few years a pair or two have visited the Reed-beds and nested there. When nesting time approaches they become very pugnacious, driving away all birds, large or small, from their nesting site, or feeding trees. They are restless birds, always on the move, flying from tree to tree, hanging in all attitudes as they search the blossoms for nectar and insects. They shift considerably according to food supply, for in some districts when *Eucalypts* and *Banksias* are in blossom these birds become very plentiful, but as soon as the trees cease flowering the birds will move to another district. They nest early and late; it is not uncommon to see young about in August, and as late as February.

Flight.—Strong, undulating, but erratic at times.

Food.—Consists of nectar, also insects, for which they diligently search the foliage, limbs, and trunks of trees; sometimes catching them on the wing.

Note.—Harsh and varied; when feeding, a sharp short call like "clock" repeated at intervals of two or three minutes. At nesting time the male bird will perch in an exposed position and utter a series of remarkable notes, lifting his head until his bill is straight up, the throat swelled out, and tail raised. Most of the notes are harsh and guttural, but at times sharp and resembling the words "Keckwick, keckwick" repeated several times in quick succession.

The young will follow the parent birds round all day long till fully fledged, uttering a monotonous and incessant call of "quock, quock", only pausing when food is thrust into their mouths by the parent birds.

Nest.—Invariably placed in an upright fork, and is open. The nest is small in comparison to the bird, and generally consists of twigs, lined with rootlets. The female sits very closely on the nest, and the male bird brings her most of her food.

Eggs.—Clutch two or three, generally the former, but not infrequently only one is laid. The ground colour varies from white faintly tinged with yellowish pink, to light reddish brown. The spots, which are chiefly grouped about the larger end, are generally rounded in shape, but occasional irregular blotches occur, they vary in colour from very dark reddish brown to bright reddish brown. Average measurement of 7 eggs—2.81 c.m. x 2.05 c.m. Largest egg, 2.90 c.m. x 2.15 c.m.; smallest egg, 2.70 c.m. x 2.00 c.m.

A Visit to the Breeding Grounds of Swan and Pelican on the Coorong.

By S. A. White, C.M.B.O.U.

Some few years ago a misguided Government was paying blood-money for cormorants and pelicans. Many thousands of these useful birds were destroyed in spite of all the efforts of ornithologists to prevent it. Eventually the South Australian Ornithological Association was able to obtain a lease of the islands in the Coorong, upon which the swans and pelicans nested.

A caretaker was recommended by the Association and appointed by the Government. Notices were erected upon the islands, and all went well till Mr. Goldfinch left on active service, and another caretaker had to be appointed.

Of late, reports had reached the Association that things were not altogether satisfactory, so upon the authority of the Association, the writer left by train for Milang upon a trip of inspection. Crossing Lake Alexandrina from Milang by steamer, thence through the passage and over Lake Albert. Meningie was reached the same evening. Mr. Thos. McCallum was there to meet me, and before leaving the township arrangements were made with a resident to drive over to Woods Point taking with him a boat, which would be in readiness on the third day. My kind friend motored me out to his well known station, McGrath's Flat. Next morning we rode to some high ground



S. A. White, Photographer. YOUNG PELICANS AWAITING THE PARENT BIRDS' ARRIVAL WITH FOOD.

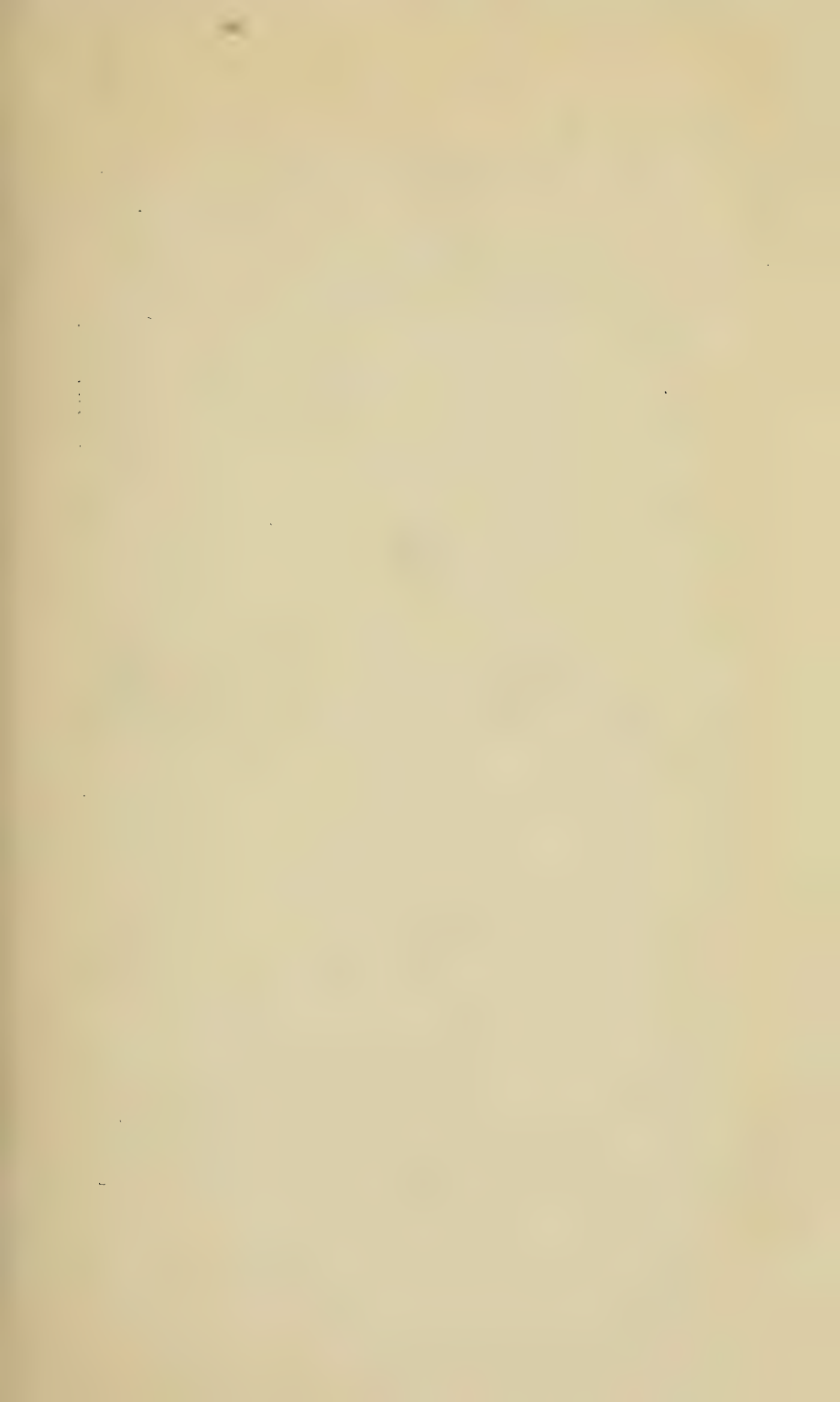
overlooking the Coorong for many miles on either side. One of the most wonderful and pleasing sights opened out before me. The fine sheet of water was dotted over by many small islands and rocks, but the water itself was covered in wild-fowl, swans in thousands, mountain ducks, black ducks, and teal in countless numbers. The beautiful white egrets and spoonbill cranes, relieved the dark masses of ducks. Some of the islands were covered with silver gulls, and pelicans in small parties were dotted all along. After breakfast Mounted Constable Kaine arrived from Meningie, and my host motored us over to Hack's Point. M.C. Kaine wished to see Mr. Appenkamp in reference to a report he had sent in. After a long conversation with Mr. Appenkamp, the caretaker, upon the birds under his care, we made arrangements to meet after lunch at the same spot, and then row up to the islands upon which the swans nest. Mr. McCallum having kindly supplied me with a horse, M.C. Kaine accompanied me to the appointed spot, where the caretaker was waiting with a boat, and we started off upon a long and a hard pull along the Coorong, passing many islands on the way. But it is only those islands completely surrounded by deep water upon which the swans will nest. Reaching the first swan island the boat was pulled into a small cove, and we landed near a beautiful little spot of sandy beach which made an ideal landing place for the swans because it shelved to the higher ground. It was a glorious sight that we beheld upon the top of the island, for amongst the tussock grass dozens of nests of the beautiful swans were placed; they contained from three to six eggs, and each nest was placed well out of the reach of its neighbour. The birds were swimming close up to the island and giving forth their plaintiff calls. Having seen other islands we made our way back in the dark. All had a hard pull, for in the dark we missed the channel upon several occasions, and became entangled in the water weed. After leaving the boat we had a scramble up the cliffs in the darkness, and a hunt in the low scrub for our horses. Even when mounted our progress was very slow, owing to the ground being honey-combed by rabbits. Consequently it was very late when we reached McGrath's Flat, and our host met us on the track thinking something had happened to us. Next day Mr. McCallum took us in his car and we started out to the spot where the boat was to be in readiness to take me off to Pelican Island. The old overland track to Melbourne was in a bad state, and the car had to negotiate one of the bad sanddrifts. Having reached

the meeting place the man who had gone up from Meningie was in waiting with the boat, and we put off for the island. A large white patch of birds was soon seen on the elevated part of the island, and there was a great string of birds coming and going, some on their way to the Murray River, and others on their way back with a load of golden carp for their young. Pulling up to the high side of the island we landed, and I crept quietly up and looked over the top. It was a fine sight to see so many pelicans. They were of all ages, from squabs not long hatched, to many ready to leave the island, and there were also many old birds watching over their young. I examined much of the food which had been vomited up by the young birds in their agitation, and found that there was not one marketable species of fish amongst the lot, the bulk of the food being imported golden carp, a useless fish, and amongst them a few congolly. A yellow-faced cormorant rookery was close by, but only a few young birds remained, which joined company with the young pelicans upon my approach. After a few photographs had been taken I withdrew and returned to the boat. Upon my return I visited the scene of an early massacre, where a mass of headless bodies of young pelicans still remained to mark the spot at which some cold-blooded scoundrel had chopped off hundreds of these fine birds' heads for the paltry sum of one penny each.

It is grand to think those days are past, and that those who authorised and took part in the shocking work now see the mistake. Reaching the mainland we lit a fire, boiled the billy, and partook of a lunch which our kind host had prepared.

We reached the homestead before dark, and next morning my kind friend motored me in to Meningie to catch the early morning boat. So ended a pleasant trip to the home of the pelican and the swan.

I am under a deep debt of gratitude to the McCallum brothers of McGrath's Flat for all their kindness, and I was delighted to make the acquaintance of such an energetic officer and friend of the birds as M.C. Kaine.





A. M. Morgan, Photo.

YOUNG CORMORANTS (*Hypoleucis rostrata hypoleucis*) JUST OUT OF THE NEST.

Some Observations on the Nesting and the Young of Cormorants.

By A. M. Morgan, M.B., Ch.B.

Having heard that the Great Black Cormorant (*Phalacrocorax carbo novae-hollandiae*) was nesting on Mundoo Island, my wife, son, and self made a trip to examine into the matter.

On November 24th, 1917, Mr. F. H. Downer kindly motored us to Goolwa, where a motor boat was waiting to convey us to Ram Island, where the shooting hut of Dr. Benson and Messrs. Cullen and Marshall had been placed at our disposal for the night.

After breakfast at 6 a.m. we went in the motor boat as far as it could get, and thence in the dinghy to the shaggery. On the way several of the bark nests of the Moorhen (*Gallinula tenebrosa*) were seen placed in the butts of large tea trees standing in the water, the contents were in all stages from fresh eggs to newly hatched young. One nest, which our boatman told us had been robbed three weeks before again contained seven eggs of a very light colour. We also found several nests of the Little Grass Bird containing eggs in the overhanging branches. On rounding a bend we came suddenly upon the nesting shags. The nests were all built of tea tree twigs, apparently broken off by the birds themselves, for in the new nests some of the twigs still had green leaves upon them. Only two species were nesting, the little black (*Mesocarbo ater*), and the little pied (*Microcarbo melanoleucus*); there were no Big Black Shags present at all, and although there was a number of orange-faced birds sitting about in the trees none of them was nesting. The two nesting species were more or less mingled, but there was a tendency for each to nest in small groups by themselves, though occasionally one or the other species had a nest in an alien group. The contents of the nests varied from incomplete clutches of fresh eggs to young birds able to fly. The young, when little more than half grown, disgorged the contents of their stomachs, flopped into the water and dived out of sight directly the nests were approached. It was a puzzle to us how they regained their nests, some of which were 10 or 12 feet from the water, until we saw one climbing up the branches using beak, claws, and wings.

The young of both species are quite black, and have the face and forehead bare until nearly full grown. It is not until

about half grown that the white feathers of the breast appear on the little pied bird, and even after they are able to fly the under part of the neck remains black.

The disgorged fish sank when ejected, hence very few were seen, the only species identified was the introduced carp, which has become very numerous in the river and lakes of late years.

The note of the young birds is a feeble chirping, uttered when the nest was approached or an old bird flew overhead; the adults were quite silent all the time.

After examining the shaggery some time was spent in rowing about amongst the flooded tea trees and samphire, and some more moorhens' and grass birds' nests were examined; a disused swan's nest was also seen as well as many young black ducks and a few young swans. After an unsuccessful search for nests of the Baldecoot (*Porphyrio melanotus*), and the Musk Duck (*Biziura lobata*), we had lunch at the hut, and returned to Goolwa; a pleasant drive through the hills brought us back to Adelaide the same evening.

On the 4th of May of this year, my wife, son, and self journeyed to Port Broughton to pay a visit to the Orange-faced Cormorants (*Hypoleucus varius hypoleucus*), which we had heard were breeding on Shag Island.

On the morning of May 5th Mr. Wall, Jun., sailed us down the channel to as near the island as the boat could get, and then rowed us some further distance in the dinghy, after which a wade of a quarter of a mile brought us to the mangroves, at that time the tide being low, out of the water. The first birds met with were a flock of Silver Gulls (*Bruchigavia novae-hollandiae*), about 200 in number, evidently in attendance for the purpose of picking up any unconsidered trifles such as disgorged fish and unprotected eggs or chicks; they were also eating the dead birds, for one such was seen with the breast muscles picked away, and many gulls' tracks about it in the mud. A few crows were also hanging about the rookery, sharing the office of scavengers with the gulls. The Island is such only at low water, the incoming tide covering all the mud and flooding the butts of the mangroves. A narrow belt of trees facing the sea was unoccupied, but on passing these we found ourselves at once in the rookery. The nests are all in the trees, some within reach of the hand, but many as high as 10 or 12 feet up, and sometimes as many as a dozen nests in one small tree; they are built of mangrove and samphire sticks, and at the time of our visit were mostly

lined with excrement, in some a few small shells were seen. The rookery covered an area of about two acres, all the trees in which were covered with excrement, leafless, and apparently dying. I had noticed on a former visit that the trees in which last year's nests were placed were quite dead. The smell, though not exactly aromatic, was by no means unbearable, perhaps because the ground was washed by each incoming tide. As we approached the trees the young birds disgorged the fish in their stomachs, and those old enough to do so flopped to the mud and waddled off towards the water. It was not very difficult to catch one of two for examination, but care had to be taken to avoid their sharply hooked bills, for they bite savagely when caught. By far the greater number of the birds were nearly full grown, though here and there younger birds were found, and a few nests still contained eggs in clutches of two or three.

Beneath the trees the mud was thickly strewn with disgorged fish in varying stages of digestion. The most numerous species was the Green Weedie (*Odax waterhousei*), next came the Rock Flathead (*Platycephalus* sp.). This fish, unlike the common Flathead (*P. fuscus*), lives on rocks and weedy bottoms; it is, I suppose, this species which Capt. S. A. White found in the stomachs of shags he dissected at Port Gawler (S.A. Ornithologist, Vol. ii., pp. 178 and 179). It is probably an edible fish, but is rarely if ever seen in the market. The next commonest was the Cat Fish (*Cnidoglanus megastomus*), many of which were seen; there were also a few Trumpeter (*Atypichthys strigatus*), and one each of the Garfish (*Hemiramphus intermedius*), and the Brown Weedie (*Odax balteatus*). Some of the fish measured as much as a foot in length, and one about $\frac{3}{4}$ lb. weight was seen. The young birds do not seem at all particular which nest they sit on; an adult sitting on two chicks and an egg was constantly pecking off young birds which were trying to get on to her nest, which they immediately occupied when she was driven off. The ownership of nests is a constant source of quarrelling amongst the young birds themselves, and when pecking and squabbling they are rather more noisy than usual. The young birds even when only a quarter grown are excellent climbers, using the hooked point of the bill, the wings and claws to assist themselves back into their nests, and when climbing the trees sometimes hoist themselves up by hooking the neck into a forked branch. Occasionally they get stuck and perish; we released one bird which was caught by a foot in a fork, and saw seve-

ral dead ones in similar situations. The note of the young birds is a sibilant squawk, feeble by itself, but when some thousands of birds are uttering it at the same time the volume of sound is considerable. The old birds make no sound at all when flying over, but when a silver gull or a crow becomes too inquisitive they utter a hoarse grunting sound. When the adults or well-grown young get angry or afraid they half open the bill, partly extend the rami of the lower jaw, and keep the pouch and skin of the neck in a quiver.

The newly hatched chick is quite naked, of a greenish black colour above, and reddish black below. The eyes are closed.

Quarter grown young have the head naked, all the upper parts and wings covered with scanty black down, and the under parts with scanty white down; iris, dull brown.

Half grown birds have the forehead and crown of the head bare and of a light greenish black colour; iris, dull brown; pouch and bill, dull greenish yellow; neck and breast, white. The dome of neck in these two stages is much stained from putting the head down the parents gullet when feeding.

The fully grown nestling has the under parts of the neck and breast covered with white down, the upper parts and wings, dull black; iris, dull brown; beak, pouch, and bare parts of the face, pale dull yellow.

First stage out of the nest. Beak and soft parts of head, pale yellow; chin, neck, and upper part of breast, strongly mottled with black; abdomen, less mottled; iris, dull brown.

Second stage. Chin, white; middle of neck and upper part of breast, mottled with black; iris and soft parts as in first stage.

Third stage. Upper part of breast and abdomen, sparingly spotted with black; iris and soft part as in first stage.

Fourth Stage. Beak more greenish, culmen, dark brown colour; iris, dull brown, or brown with a grey margin, or all grey; bare part of face, dull yellow; abdomen, with a few black spots.

Fifth Stage. Ready to fly; all the under parts, white; wings and upper parts, dull black; iris, grey; bill and bare parts as in 4th stage.

The grey of the iris taking the place of the brown is probably the prelude to the sea green of the adult, but none of the birds we were able to capture had yet attained to that stage.

The breeding adult has a narrow band of green round the eye, all the rest of the face including the bases of the rami of the lower jaw is bright orange; bill, mottled horn colour; lower mandible somewhat darker. I had previously thought that the stage described by me (S.A. Ornithologist, Vol. iii., p. 77), was the breeding plumage. That colouration is probably the adult non-breeding plumage, or possibly a prelude to the breeding plumage. The occurrence of the black feathers on the breast of the young of both the little pied and orange faced birds is of phylo-genetic interest as indicating their descent from an all black ancestor.

Birds of the North and North-West of Australia.

From Skins and Notes by the late Capt. T. H. Bowyer-Bower.

By GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., ETC.

No. 15.

251. WHITLOCKA MELANURA MELANURA. Black-tailed Tree Creeper.

Climacteris melanura (Gould). Proc. Zool. Soc. Lond., 1842, p. 138, 1842. Derby, North-west Australia.

No. 160—♀. Length, 6.6 inches (21/6/86).

Irides dark brown; bill, legs, and feet black.

Thinly dispersed through the country, generally seen singly or in pairs, which appear to keep at some distance from each other. They utter a very shrill harsh note when on the tree, and also just before flying. It never flies far, but alights in another tree about 20 yards off, clinging to the trunk and working upwards examining all the cracks and nooks for insects.

No. 187—♂. Length, 6.7 inches (26/6/86).

No. 207—♀. Length, 6.6 inches (29/6/86).

No. 208—♂. Length, 7.2 inches, (29/6/86).

No. 237—♀. Length, 7 inches (13/7/86).

No. 239—♂. Length, 7.2 inches (13/7/86).

No. 369—♀. Length, 6.9 inches (26/9/86).

255. AUSTRODICAECUM HIRUNDINACEUM TORMENTI. Western Mistletoe Bird.

Dicaeum hirundinaceum tormenti (Mathews). Nov. Zool., Vol. XVIII., p. 387, 1912. Point Torment, North-west Australia.

- No. 266—♀. Length, 4.1 inches (16/7/86).
 No. 334—♂. Length, 4.1 inches (30/7/86).
 No. 356—♂. Length, 4. inches (2/8/86).
 No. 360—♀. Length, 3.9 inches (3/8/86).
 No. 392—♀. Length 4.1 inches (12/10/86).
 No. 501—♂. Length, 4.1 inches (3/11/86).

Large seeds are found in this bird, it seemed almost impossible for so small a bird to contain such large seeds.

257. *PARDALOTUS MELANOCEPHALUS TORMENTI*. Point Torment Pardalote.

Pardalotus melanocephalus tormenti (Mathews). Austral Av., Rec. Vol. I., p. 96, 1912. Point Torment, N.W. Australia.

- No. 166—♀. Length, 3.7 inches (21/6/86).

Irides greenish brown, bill black, lighter at the base, and a light stripe from the base to tip of the lower mandible.

- No. 167—♂. Length, 3.8 inches (22/6/86).

- No. 168—♂. Length, 3.8 inches (22/6/86).

- No. 172—♀. Length, 3.8 inches (23/6/86).

Irides greenish brown; bill brown, becoming whitish at the gape and the base of the lower mandible; feet and legs brown.

- No. 192—♂. Length, 3.7 inches (27/6/86).

- No. 274—♂. Length, 3.8 inches (17/7/86).

- No. 309—♂. Length, 4. inches (24/7/86).

- No. 378—♂. Length 4. inches (8/10/86).

Although frequenting the ground a great deal, they are also found at the top of the highest trees. They are difficult to see when flying; when doing so they utter a clear loud note often repeated.

258. *CYRTOSTOMUS FENATUS MACGILLIVRAYI*. Cape York Sun Bird.

Cinnyris fenata macgillivrayi (Mathews). Austral Av. Rec., Vol. I., p. 97, 1912. Cape York.

- No. 17—♂. May 4th, 1886. Thursday Island.

259. *MELITHREPTUS LUNATUS SUBALBOGULARIS*. Allied White-naped Honey-eater.

Melithreptus lunatus subalbogularis (Mathews). Nov. Zool., Vol. XVIII., p. 392, 1912. Derby, North-west Australia.

- No. 234—♀. Length, 4.9 inches (29/8/86).

Irides reddish brown, bill black, legs and feet flesh colour.

- No. 236—♂ Length, 4.9 inches (immature), (13/7/86).

- No. 339—♂. Length, 5.3 inches.

Irides dull red, naked skin over the eye, which is very small and easily overlooked (indeed the skin has to be stretched to observe it) white; bill black; legs brownish flesh.

No. 345—♂. Length, 5.5 inches (13/7/86).

No. 520—♂. Length, 5.6 inches (6/11/86).

260. MELITHREPTUS GULARIS COONGANI. Western Black-chinned Honey-eater.

Melithreptus gularis coongani (Mathews). Nov. Zool., Vol. XVIII., p. 392, 1912. Coongan River, West Australia.

No. 88—♀. Length, 6. inches (2/6/86).

Irides dark brown, naked skin over eye emerald green; bill black; legs ochre.

No. 89—♂. Length, 6. inches (2/6/86).

No. 110—♂. Length, 6.4 inches (7/6/86).

No. 111—♀. Length, 6. inches (8/6/86).

No. 332—♂. Length, 6.1 inches (29/7/86).

No. 366—♀. Length, 6.5 inches (3/8/86).

No. 367—♂. Length, 6.5 inches (3/8/86).

No. 491—♂. Length, 6.3 inches (2/11/86).

264. CISSOMELA PECTORALIS PECTORALIS. Banded Honey-eater.

Myzomela pectoralis (Gould). Proc. Zool. Soc. Lond., 1840, p. 170, 1841. North-west Australia.

No. 68—♂. Length, 5.1 inches (31/5/86).

Irides dark brown; legs dark greyish black.

No. 331—♀. Length, 4.8 inches (29/7/86).

No. 380—♂. Length, 5.2 inches (6/8/86).

No. 412—♀. Length, 4.8 inches (18/10/86).

269. CONOPOPHILA RUFOGULARIS RUFOGULARIS. Red-throated Honey-eater.

Entomophila rufogularis (Gould). Proc. Zool. Soc. Lond., 1842, p. 137, 1843. Derby, North-west Australia.

No. 49—♀. Length, 5.2 inches (26/5/86).

Irides brown, bill black, lower mandible fleshy white at the base; bill black; gape yellow; feet lavender.

No. 64—♂. Length, 4.8 inches (29/5/86).

No. 78—♀. Length, 4.8 inches (1/6/86).

Irides greyish brown; upper mandible grey, black at the tip; lower bluish flesh colour; gape greenish white; legs bluish grey.

No. 79—♀. Length, 4.7 inches.

No. 80—♂. Length, 4.9 inches (2/6/86).

No. 81—♀. Length, 5. inches (2/6/86).

No. 86—♂. Length, 5.3 inches (2/6/86).

No. 90—♂. Length, 4.9 inches (2/6/86).

No. 263—♂. Length, 5.6 inches (3/9/86).

Irides greyish brown; bill black, lighter at the base, more so on the lower mandible; legs and feet lead colour.

Very plentiful in the flowering trees, and they keep off most other birds.

No. 281—♂. Length, 4.9 inches (6/9/86).

No. 285—♂. Length, 5.4 inches (6/9/86).

No. 286—♂. Length, 5.3 inches (7/9/86).

No. 290—♂. Length, 5. inches (7/9/86).

No. 295—♀. Length, 4.7 inches (8/9/86).

271. *STIGMATOPS INDISTINCTA MEDIA*. Least Honey-eater.

Stigmatops indistincta media (Mathews). Nov. Zool., Vol. XVIII, p. 403, 1912. Parry's Creek, North-west Australia.

No. 66—♂. Length, 5.6 inches (30/5/86).

Irides dark brown; bill black; feet greyish black.

No. 74—♂. Length, 5.5 inches (1/6/86).

Irides dark brown; bill black; legs bluish grey.

No. 76—♂. Length 6. inches (1/6/86).

Irides dark brown; bill black; feet and legs greyish black.

No. 77—♀. Length, 5. inches (1/6/86).

Irides dark brown; bill brown; gape yellow; feet lead.

No. 296—♂. Length, 5.7 inches (10/9/86).

No. 521—♂. Length, 5.5 inches (6/11/86).

271. *PTILOTINA ANALOGA NOTATA*. Yellow-spotted Honey-eater.

Ptilotis notata (Gould). Ann. Mag. Nat. Hert. Ser II., Vol. XX., p. 269, 1867. Cape York, Queensland.

No. 18—20 ♂ Thursday Island, May 86. Cape Yellow.

274. *MELIPHAGA SONORA ROGERSI*. North-western Singing Honey-eater.

Ptilotis sonora rogersi (Mathews). Nov. Zool., Vol. XVIII., p. 406, 1912. Wyndham, North-west Australia.

No. 33—♂. Length, 8. inches (21/5/86).

Irides brown; bill black; legs grey.

No. 62—♀. Length, 7.1 inches (29/5/86).

Irides brown; bill black; gape yellowish white; legs and feet bluish black.

No. 342—♀. Length, 7.1 inches (18/9/86).

Irides very dark grey; bill black; gape yellowish white; legs and feet lead colour.

About Members.

Though late, we none the less sincerely congratulate our honored Patron, Sir George Murray, on his attainment to the distinguished position of Chief Justice and Lieutenant Governor of South Australia, also on the recently conferred honor of Knighthood.

We have to congratulate our only Hon. Member, Mr. G. M. Mathews, of England, and of world wide ornithological fame, on having attained a seat upon the Council of the British Ornithological Union. This is an honour which testifies to the great ornithological ability of our Hon. Member, and also reflects partly upon Australia in general. Every Australian Ornithologist must feel pleased at knowing we have such an able representative on the Council of the world's first Ornithological Body.

The British Ornithologists' Union recently conferred upon Capt. S. A. White the honour of Distinguished Colonial Ornithologist, an honour that is confined to ten most eminent ornithologists in the British Dominions. This is indeed a fitting tribute in recognition of Capt. White's scientific work for Australian ornithology, and members and bird lovers heartily congratulate our worthy President on this well-deserved honour.

One of our foundation members, Dr. A. M. Morgan, has made a visit to the Cormorant Rookery at Port Broughton of late, and a paper appears in this number upon the subject.

All will be glad to know that one of our members, Dr. Chenery, who came to Adelaide to undergo a severe operation has returned to Wentworth quite restored to health, and we are hoping to have some of his sound ornithological observations in our future numbers.

Our Vice-President, Mr. E. Ashby, in company with his son (Dr. Ashby), left for America last month. Mr. Ashby hopes to confer with American Ornithologists.

Another of our members, Mr. F. E. Parsons, left on business for Yorke Peninsula last month, as this member generally combines some field work with his duties, we may look forward to some bird observations at least.

Our President made an inspection of the Islands in the Coorong for the Association, and reported upon the nesting of swans and pelicans. A short article on this subject

appears in this number. He also made one of his periodical trips along the Great Western Railway to investigate the movement of the imported sparrows towards the west, this work being carried out in an honorary capacity for the Commonwealth Council of Science and Industry.

OBITUARY.

It is our painful duty to record two losses of late.

Col. W. V. Legge, R.A., C.M.B.O.U., who died in Tasmania, will be greatly missed in Ornithological circles. Col. Legge's ornithological work is world wide, his "Birds of Ceylon" being a standard work. His geological work is very extensive, and he has contributed largely to this branch of science. Some years ago he made a geological, geographical, and ornithological investigation of the Great Lakes district in Tasmania, taking surroundings of the lakes, and observing the water birds.

Col. Legge was the first President of the Australian Ornithologists' Union, and was a constant contributor to "The Emu", his articles also appeared in "The Ibis". Although of late years the Colonel was very conservative in his ornithological views the new school has always recognised that his ornithology was very sound.

We have sustained a great loss in the early closing of the life of Mr. M. E. Saunders, R.A.O.U. He was a comparatively young member of our Association, but one of great promise, for he was a constant attendant at our monthly meetings, and a keen field worker.

Distribution of *Lalage tricolor*.

In the April number of "The South Australian Ornithologist" (Vol. III., Part 6, Page 162), doubt was expressed as to the occurrence of *Lalage tricolor* in Tasmania. Dealing with this question Mr. Clive E. Lord, of the Tasmanian Museum, Hobart, and compiler of a list of Tasmanian Birds, informs us that the point has been definitely settled, the bird having been recorded on several occasions from the north coast of Tasmania.

Living *versus* Dead Names for Australian Birds.

(By A. J. Campbell, C.M.B.O.U., Melbourne.)

Much attention has been paid recently to nomenclature in connection with our birds, perhaps more so than to ornithology itself—which study should be the first consideration. Nomenclature is a means to an end only. Nomenclature as the dictionary states means “names appropriated to any science;” not that the science is appropriated to the names.

I, too, have been tempted to put ornithology aside for a space to look into names and the methods of nomenclaturists, if haply I may find enlightenment.

Let me take, at random, an instance illustrative of my title:—“Living *v.* Dead Names.” The fine Tasmanian Brown, or Swamp-Quail has been known by the living and well-supported, name of *Synoicus diemenensis*, with Gould’s most excellent life-coloured plate thereof, for the last seventy years—the ordinary life of man. Now Mr. G. M. Mathews in his laborious work of research has resurrected the dead (obscure and obsolete) specific name of *ypsilophorus*—a prior name may be, but as dead as Julius Cæsar, and the work of reference given, old, foreign and obsolete—“Bosc, Jour. d.Hist. Nat., 1792.”

That is not all, Mr. Mathews in his enthusiasm (which we all admire) has also discovered that some other animal was previously called *Synoicum*; therefore, on the score of the so-called science of “one-letterism” *Synoicus* cannot stand, so says that authority, and he proposes the new genus *Ypsilophorus*, and as there are sub-species of the Swamp-Quail, in trinomial terms the resurrected and glorified name for the Tasmanian Quail would become:—*Ypsilophorus ypsilophorus ypsilophorus*,* as against the present living and appropriate name:—*Synoicus diemenensis*. In the name of reason which term shall stand? Surely the latter. “Let the dead bury their dead,” is divine philosophy. Even, as the proverb goes, a “living dog is better than a dead lion.”

Ah, but I may be informed that the “Rules of National Nomenclature” must be abided by. (By the way, probably there are not three copies in the whole of the Commonwealth, and it would be interesting, in these terrible days of war, to

* The Austral Arian Record, Vol. III., p. 63.

know the names and nationalities of the original Committee who compiled them). My reply is, if these rules turn the living into the dead, they were not made for, or by Australians.

We sometimes hear the stereotyped expression, "if we do not conform to the National Codes of Nomenclature, we shall be behind other nations in ornithological science." Nonsense! Australian Soldiers did not lag behind in the great World-War. Neither shall we be behind in ornithology, because we desire certain living names that breathe of Australia, and are an inspiration, instead of names like "dry bones" dug from old and musty literary graves.

However, if the august National Committee can make rules it can also make exception thereto, and may possibly issue "an opinion" in favour of present living names *not ornithologically incorrect, or scientifically wrong* of certain purely endemic Australian birds. Before another "Check-list" takes final shape let us consider an Australian *Nomina conservanda*, or better still, an "Ornithologist's Memorial," in memory of Australia's sons, who have fought, and not a few have fallen for their country in the great war—a list of Time-honoured and historic names of well-known birds, which names that "grave-digger"—the arbitrary "Law of Priority" proposes to bury. We can then approach the National Committee, and say:—"This is a list which the Nation desires you to be good enough to honour, and to let live for all time."

Such a "Memorial Exception List" would not exceed 40 names, or about 5 per cent of the names on existing local lists. If this were happily accomplished, I venture to suppose we would have an *Australian List of Commonwealth Birds*, which all workers would acknowledge to be intelligible, practical, and permanent.

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor and Explorer.

By His Son, S. A. White, C.M.B.O.U.

XVII. THE ORNITHOLOGIST AND SAILOR.

Monday, the 2nd of August the yacht remained at anchor, and my father spent the morning packing away many of his specimens, and clearing up his specimen room and cabin. In a

few notes he says: "It seems strange after the last few weeks of rush and bustle to have a little time to myself, and I now find time to have a good clean up and put things away. I think my sores are better after a day's quiet." Andrews went off in the morning with a gun, and Cockerell left in the afternoon, but neither of these collectors put in an appearance at dark, and were given over as bushed. About 11 p.m. Cockerell turned up after a very rough time in the scrub. Andrews was out all night and nearly all the next day. My father set out in search of him, and at length he located the missing man's whereabouts by firing his gun several times and awaiting Andrew's answering shot. Samuel White in his note book makes the following comment: "Andrews out all night, had to go after him. He must have had a lively time of it as the mosquitos are very troublesome in this part of the island. This is the second time within a few days that my taxidermists have lost themselves. This corner of the island seems to be a quiet spot, no natives living here, and there are no cocoanut palms to be seen, consequently a few great Birds of Paradise live here in quietude, and their calls could be heard from the yacht. As soon as I got Andrews on board and saw that he had some nourishing food after his wet and rough time in the tropical scrub, I took Cockerell, ordered a boat out, and landed a little distance up the coast. We went in search of the great bird, and we were successful in securing three fine specimens. I had a good opportunity of watching these beautiful birds to-day, and I still find that their actions resemble those of the Rifle Bird of Australia. Some of them clung to the branches of the tree in which they were dancing, with their backs downwards, stretching their wings, and waving their plumes, and giving forth their loud cry of wark, wark, repeated several times. I was unable to stay out very long owing to my sores giving me much pain when I walked, and the country is full of 'Lawyer Palm', which makes travelling very difficult under any circumstances. While out after Andrews to-day I observed more palms than usual, some of them very tall and slender, perhaps 70 feet high and not more than six inches in diameter, being but a trifle larger at the lower end, than near the top. I saw a good many cycads, which were like those growing in Australia. The country here as elsewhere is low, and in many places the soil is very shallow, notwithstanding which there are some very large, and tall trees growing at frequent intervals. Birds were not numerous, except the 'Great Bird' and a large rail, but

the latter is shy, and as it runs on the ground and amongst the undergrowth it is difficult to obtain; the natives sometimes snare them. The 'Great Bird' is the shyest of them all. If a stick is cracked, or the slightest noise be made whilst approaching him he is off in an instant. As we lie here at anchor a corner of the island lies to the south of us, the Watalli Channel to the east, the little round island of "Polo Baby" (Pig Island) to the north, and the open sea to the west. Northward from Polo Baby lies the Island of "Wamma", on which is situated the town of 'Dobo', a very old trading port for the Malay and Macassar men, and distant about twelve miles. I will not visit Dobo this time as there is nothing to interest me more than I have already seen. I have been very troubled of late with the master and crew, and have determined to return to Australia and fit out with fresh Officers and crew." This is the first time that my father mentions the trouble with his officers and crew, but he had been suffering a great disappointment for many days, and had to put up with a great deal of insolence from the master. The weather was still showery as usual. On Wednesday 4th, the anchor was heaved, and Samuel White gave instructions to the master to make along the west coast of the Aru's and fetch up at the south end of the Island of Trangan. The wind was very light and weather finer than usual. The yacht kept on her course all night, but the wind being light she made very little headway. About nine next morning the wind freshened, and about 11 a.m. the vessel came to anchor off the west shore of Trangan. Some of the natives were soon off, and the crew with one officer went on shore with the big boat to cut and bring off firewood. Samuel White seems to have stayed on board, as he was very distrustful of his crew, and his suspicions were well founded as subsequent events will show. The next day the crew were busy bringing off wood. Cockrell went on shore and returned with a few birds, amongst them two beautiful little King Birds of Paradise. My father seems to have found it hard to make up his mind to return when there was so much work in front of him; he paced the deck nearly all that night, and seems to have made up his mind, for I have found the following notes written on Saturday 7th of August: "I gave orders this morning to trim ship by putting some of the stores in the skinning room aft, stowing away firewood, and had some spare cable chains shifted aft. I am afraid the master will drop to my move, and guess that I intend to return, I have not told him of my determination yet. A number of natives came off this morning to sell their

stuff. I purchased platted and coloured mats, cocoanuts, fish, and many other things, like the rest of Aru's things they are very dear. I had to give a flat cake of tobacco for every four nuts, one cake of tobacco for three small fish. The men who came on board to-day had a very feminine appearance, both in features, and the way they dressed their hair. Many of them tied up their hair in a bunch behind, and adorned it with beads, and wore ear-rings. As soon as all was clear and straight I gave orders to get the anchor up, and then gave the master his course, and told him to keep on the one course till such times as I gave orders to alter it. I wonder if he guesses that I am returning, but I am determined to return and refit, and reman my vessel before visiting New Guinea. I find that my officers, crew, and staff are altogether unfit for this kind of work. The master is especially a beastly fellow, and quite unfit for his position. At dark we were still in sight of the island we had left at mid-day, for the wind was very light. So the land of the Aru's and 600 miles of a nasty choppy sea between us and Australia, thus for a time (it was the last), and once again I must bid farewell to the land of the "Burong Mattee" (Great Bird of Paradise), and the "Gooby Gooby" (King Bird of Paradise), an out of the way corner of the earth that few Europeans ever visit. I know of only three Englishmen who have ever been there. They are all "Cranky bird or bug hunters." In this land some of the most singular and beautiful of God's creatures live and die amongst a wonderful tropical scrub. My stay has been short, and the first voyage will terminate much sooner than I anticipated, for I intended to have been out two years at least. I am determined to re-fit, for I cannot put up with insolence and bad manners on my own boat. The collecting in the islands has exceeded all my expectations, and had I gone the route and time I expected, and had been as successful all the way my collection would have been a very large one. As it is I have a nice little collection of birds, about 800 to 1,000, besides other things. A list of the birds I will make out when I have had time and an opportunity to compare and examine them." It seems that my father gave the sailing master his course, but upon going on deck before morning he found the yacht heading for the New Guinea coast. An encounter followed, of which I have no record, but from that time on Samuel White mostly steered the ship himself, and watched day and night, a strain in fearfully bad weather which was encountered, and there is no doubt all that upon a man who had over-worked himself in a tropical country, was

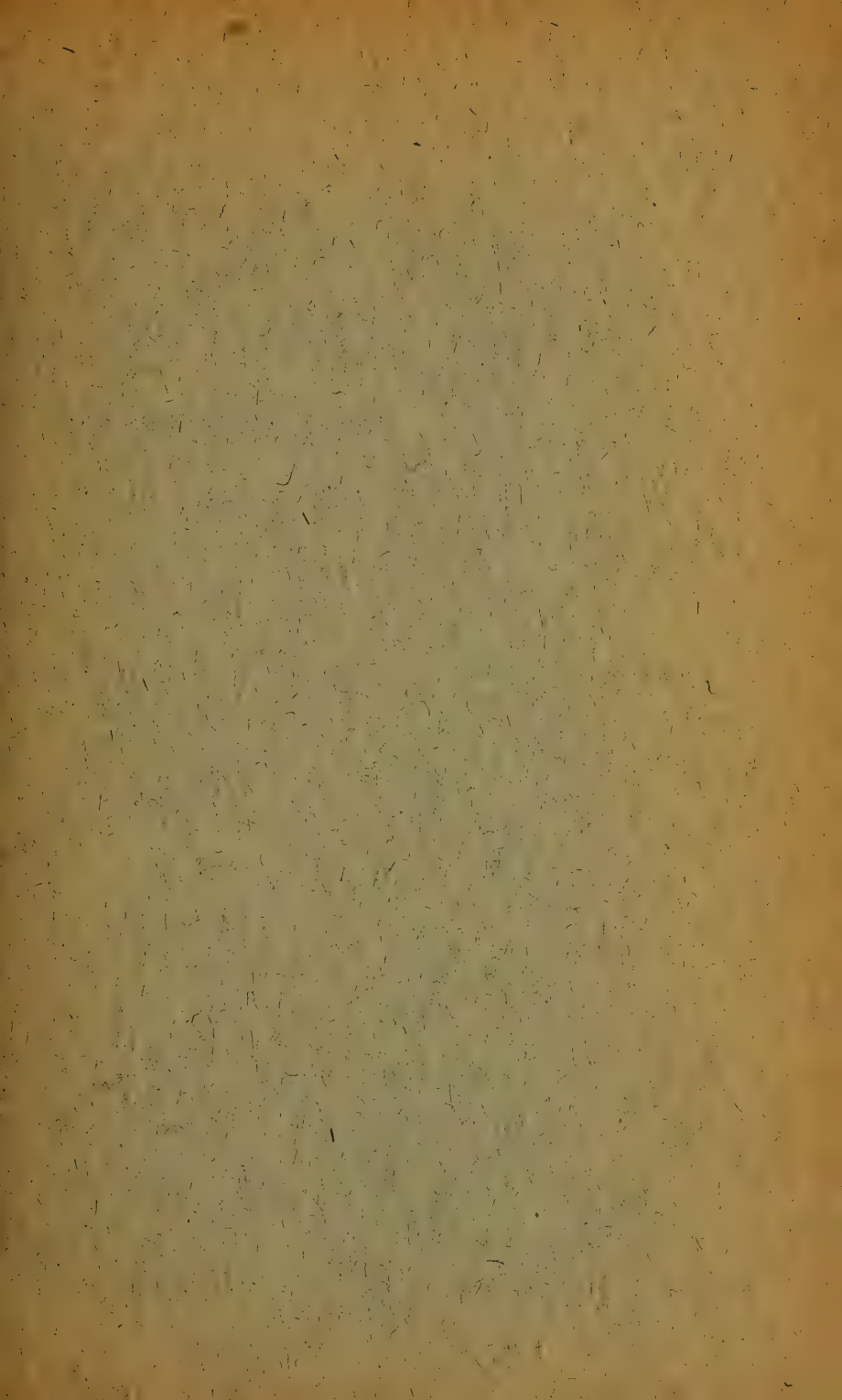
the shortening of his life. My father took a greater command over the yacht, and he set her course south, and day after day battled through a heavy sea, and the owner of the ship kept her on her course for hours drenched to the skin. He put few, if any, complaints on paper, but seems to have written a few notes at odd moments, and these I will give as they are written from day to day.


Sunday, 8th. "Since yesterday the wind has been changeable. We have been making between three and four knots, although I have had the craft close hawled. My watch on deck is almost continuous now, I cannot trust anyone. If the weather keeps as it is now I will keep the vessel on this (starboard) tack for about a week, and if she still steers south will bring about the Coburg Peninsula, then lay along the coast of Australia to Cape York. The glass is falling, and the weather looks like changing. Monday, 9th. Since yesterday the weather has kept dull and threatening. I am having continual trouble with my officers and crew. There have been numbers of birds about us, although we are hundreds of miles from land. This morning there were several tropic birds round the ship, and all the morning thousands of flying fish were rising out of our course. There seems to be two species of them, one a much larger one than the other, and they are not seen together. This morning I discovered that there were bugs in my cabin, some of the beautiful crew forward had brought a stock on board at Sydney, and they have now found their way aft. I have lived most of my life amongst vermin in the bush, but I am sure if I had flies, mosquitoes, ants, sandflies, leaches, spiders, centipedes, scorpions, snakes, and a thousand other pests found in the bush, and put them all together they are not a tenth part as bad as that disgusting pest. I find a white crew can be in every way as dirty and treacherous as a black one." A few notes written by my father, and which I fancy were made on the 10th simply say: "A heavy wind came up last night, and we have been plunging into a terrific sea. There is not a dry spot on deck, and it is impossible to keep dry. The continual watching and exposure is making it hard for me. While at the islands I did not use a coat, but now I have warm clothing and an oilskin overall, but cannot keep dry or warm. Wednesday, 11th. Last night I went aloft and saw a red glow which I fancy was from a bush fire on the Australian coast. I put the yacht about, but at sunrise there was no land in sight. A nasty heavy sea is running, and we are taking it at a bad angle, which causes much water to come on board. I

am standing on the starboard tack again to-night. 12th. Had to face off to the west last night owing to the heavy seas, and to-day we are beating up to the east. At daylight this morning the sea looked angry and black; the sun rose through a heavy bank of clouds. We are making heavy work of it to-day. 13th. Had to put the yacht about several times last night, but have her on the port tack, and will keep her there if possible to cross the Gulf of Carpentaria. The wind has gone more to the south, and the sea is not so high, still a nasty short one is worse. I had frequent soundings taken during the day, and the bottom of the ocean is very uneven, for at some castings of the lead only five fathoms of water shown, while at the next cast no bottom could be touched. 14th. Have been running into a heavy head sea all night and to-day, and I will be glad to get over to the east side of the gulf. I am having much trouble with my crew to make them obey orders. A large waterspout was seen to-day not very distant from the ship. The wind is blowing strongly again, and I have had to reduce the sail again. 15th. I changed the course again at eight bells this morning. My little vessel was making hard and dirty work of it, for terrific squalls accompanied by rain burst over us very frequently, and with a heavy sea made the craft plunge a great deal. 16th. We had a bad night; the yacht was thrashed with wind and rain, and dowsed with heavy seas all night. I have lost all confidence in my officers and men, and have to remain almost continually on deck. I have been drenched for days now, first with fresh water, and the next five minutes with salt. I will be glad to get to Cape York, when I can have a rest and straighten these fellows up. A heavy sea carried one of the boats off the davits, but fortunately it hung by the painter, and we were able to get it on board again with only the loss of the side-benches. The seas are running very high to-night. 18th. The sea is running high still, and wind blowing hard, this makes thirteen days of very dirty weather. No land in sight. I will be glad when the strain is over. 19th. The wind went down towards morning, and the sea moderated some, but at daylight rose again, and the sea regained its former height. In spite of the weather birds have been with us all through the voyage. Last night a little black backed tern came and sat on the skylight close to me while I was at the wheel, and allowed me to put my hand on it, for it was exhausted with battling against the wind and sea. Several little companies of tropic birds have been seen at different times. A day or so ago I saw an unfortunate white-


faced heron trying to alight on the vessel, but the wind blew so hard that after several attempts, and every time he blew to leeward and had to beat up again, then he went off with the wind, and if he ever made land would be an emigrant to the Aru Islands. 20th. Wind and sea went down somewhat this morning, and I was glad of the rest for I took a little sleep. My position shows me at noon to-day to be nine miles to the leeward of Booby Island, so put about on the other tack. My officers and crew are playing cards all day, and I have a job to keep any kind of discipline on board, and have ordered the watch on deck myself more than once. To-day a white tern came on board and sat close to me. I put my hand on it, and it flew off, and it soon returned and sat about the deck for hours, then seemed rested and flew off. I took it up once and found its body very thin and wasted like the others I had captured on board, and appeared as if they had been out for weeks at sea. 21st. The wind and sea got up again last night, but moderated again at noon. I find that I am out of my reckoning, and have grave suspicions that the chronometer has been interfered with. The ship was put about, and at 4 o'clock this afternoon Prince of Wales Island was some distance to windward, and at dark I ordered an anchor to be let go. I felt anxious not knowing our exact position and knowing that several reefs are situated around us I had a man stationed forward all the night, but nothing was seen. I smelt smoke distinctly, and believe it came from Prince of Wales Group. 22nd. Lifted the anchor and stood for a few hours towards Red Wallace Island, which was in sight, then tacked in towards the strait, when the wind fell and a strong tide set in, so I had an anchor let go. 23rd. This morning at daylight we got under way and beat through Endeavour Straits with a strong head wind until we reached York Island, and here anchored in six fathoms of water till the tide changed, which did not take place until 4 o'clock, when the wind rose and blew very hard. Weighed anchor and beat up to Albany and dropped anchor a little after sunset. Thus prematurely ends the first part of my expedition after five months' hard sailing, and an expenditure of £5,000. Out of this I have had about four or five weeks collecting, with one man besides myself. What my crew will do or what I will do with them I am now making up my mind, but what ever happens they will find a rigid discipline and control put upon them. A short time after anchoring Mr. Jardine kindly sent off the letters and papers addressed to the yacht.







W. K. Thomas & Co.,
Printers,
Grenfell St., Adelaide.





J. H. Riley

Vol. III.

Part 8.

THE
SOUTH AUSTRALIAN
ORNITHOLOGIST,

A Magazine of Ornithology.

1st OCTOBER, 1918.

EDITORIAL COMMITTEE:

R. CROMPTON, R.A.O.U.

A. G. EDQUIST

S. A. WHITE, C.M.B.O.U.

F. R. ZIETZ, R.A.O.U.

Price, 2/-

THE
South Australian
ORNITHOLOGIST.



Editorial Committee :

R. CROMPTON, R.A.O.U.

A. G. EDQUIST

S. A. WHITE, C.M.B.O.U

F. R. ZIETZ, R.A.O.U.

Secretary :

F. M. ANGEL, R.A.O.U.,

c/o W. D. & H. O. Wills, Ltd.,

Grenfell Street, Adelaide.

CONTENTS.

	PAGE
The South Australian Ornithological Association	319
Order Psittaciformes, Family Loriidae, Genus Glossopsitta . . .	283
Birds of the North and North-West of Australia (No. 15). Gregory M. Mathews, F.R.S.E., F.L.S., M.B.O.U.	225
Notes upon the Black-breasted Plover (<i>Zonifer tricolor</i> , Vieillot). S. A. White, C.M.B.O.U.	229
Notes upon the Brush Wattle Bird (<i>Anthochaera chrysoptera inter- media</i>) J. W. Mellor, R.A.O.U.	231
Review: "Re-naming Australian Birds — Is it Necessary?" S. A. White, C.M.B.O.U.	232
Bird Notes. McGilp Bros.	234
About Members	236
A Sketch of the Life of Samuel White—Ornithologist, Soldier, Sailor, and Explorer. By his son, S. A. White, C.M.B.O.U. . .	236
Officers and Members—S.A. Ornithological Association. . . .	243

The Editorial Committee accepts no responsibility for the views or deductions expressed by any of its contributors. The Journal welcomes a free interchange of ideas with the object of extending the knowledge of our avifauna, but the author of each article is responsible for the opinions and deductions recorded.

— THE —

South Australian Ornithologist.

VOL. III.]

1st OCTOBER, 1918.

[PART 8.

The South Australian Ornithological Association.

MONTHLY PROCEEDINGS.

28th June, 1918.

The monthly meeting of the South Australian Ornithological Association was held in the Royal Society's rooms on Friday evening. Capt. S. A. White presided. Two new members, Mr. Percy Ifould and M.C. J. Jury, were elected. Several new members were nominated. Observations were recorded by members. Dr. A. M. Morgan stated that the Black-breasted Song Lark had put in an appearance on the Seaton Golf Links, and he had observed the Warty-cheeked Honey-eater at Blackwood. Mr. A. Crompton stated that he had seen 11 Blue Cranes or White-faced Herons quite content and happy in Hazelwood Park. The Chairman remarked that it was nice to think that the birds were enjoying this beautifully timbered piece of land lately purchased for the people. Mr. F. R. Zietz reported that Landrails were plentiful down south, but many were destroyed through being caught in rabbit traps. The Chairman stated that he had seen the remains of a Landrail early in May at Wetunga, the bird evidently having been killed by a fox or cat; a little later in the month several of these birds were observed in the garden. On June 5 a New-Holland Honey-eater had built its nest in a shrub two feet from the ground, and two eggs were laid, which were hatched out, this bird being one of the earliest breeders. On June 23 one male wren which had been in brown plumage for many months was changing into his blue-and-black livery. June 24, Narrow-billed Cuckoo calling.

Mr. A. G. Edquist had the trophy on the table which had been presented by the members of the Association to be competed for by the schools. Mr. Edquist explained for the benefit of the new members present that upon one evening meeting he had suggested that it would be nice to have a challenge cup for which the school children might compete each year by means of an essay upon a native bird and tree. Thereupon the members subscribed the amount required. This had been the means of giving much pleasure to hundreds of children, had brought out much talent, and had worked wonders for the preservation of birds. Mr. Edquist stated that he had departed from the essay competition, and had substituted a sketch of a native bird and tree from life this year. This had not brought forward very many competitors, but some of the work was exceptionally good. He then handed around the winning sketches of a Magpie in several attitudes, and of a gumtree. All the members were astonished at the life-like attitudes. The Chairman thanked Mr. Edquist for giving the members the opportunity of seeing the inscribed cup, and the excellent work of the winner. He also congratulated Mr. Edquist most heartily for the grand work he was doing for bird protection among the children. The fact that many thousands of members of the bird clubs had pledged themselves to protect the native birds spoke well for the next generation. Mr. W. G. Randall was welcomed as a visitor, and requested to say a few words in reference to sea-birds and weather forecasts. The late Inspector of Oyster Fisheries said that he was confident that gulls foretold heavy weather from the west. He had often seen these birds wheeling in flocks round and round in a most disturbed way, then alighting and lining up on the beach. He spoke of many movements of the gulls before stormy weather, and then went on to say that since the blood money had been taken off the Cormorants, whiting were again appearing on the old grounds near Beatrice Spit, which is now a bird sanctuary.

26TH JULY, 1918.

The President, Capt. S. A. White, occupied the chair. Miss Harman, of Tranmere School, and Mr. L. K. McGilp, of Muloowatana Station were elected members, and nominations were received for two new members.

The Chairman reported that a meeting of representatives from scientific bodies, sportsmen, and professional shooters was held on 8th July, 1918, for the purpose of discussing the close season for ducks and quail, and the Animal and Birds Protection Acts. After a lengthy discussion a resolution was

passed approving of the extension of the close season for ducks and quail to 1st February, that the quail bag be limited to 30, and also that the gun license fee be increased to five shillings. A deputation subsequently waited upon the Minister, and placed the resolution before him, and further urged that the Animal Protection Act, the Bird Protection Act, and the Gun Act be consolidated and brought under the control of one department, instead of three as at present. As a result a new Bill was now being drafted on these lines, and if the proposals are carried out it will be a splendid thing for the birds.

The Secretary (Mr. F. M. Angel), read letters received from Mounted Constable L. Jury, of Edithburg, recommending the extension of the close season for ducks to 31st January, and protesting against the use of duck boats, and guns of over 12 bore. Mr. R. Upton, of Coomandook, reported the presence of a bird unknown to the residents. From the description given the bird was evidently a Landrail.

Mr. J. W. Mellor reported that a lot of shooting had been going on at Fulham recently, and he was pleased to say that one man had been apprehended and heavily fined. Dr. Morgan noted the Pallid Cuckoo at Seaton on 30th June, and a Red-capped robin on the Parade Grounds. Mr. J. W. Mellor stated that Landrails were plentiful at Lockleys, and a young magpie just off the nest was seen in June. Mr. A. Crompton reported that Landrails which had not been seen at Stoneyfell for the past four years were there in numbers this year, and remarkably tame. Magpies were nesting early; two pairs were seen building the previous week. Capt. White stated that one *Malurus*, which was losing its brown plumage last month, had on July 1st assumed its full blue plumage. On 3rd July the Fantail Cuckoo was calling; 5th July, Black-breasted Plover was observed sitting on four eggs, and on 6th July the first Pallid Cuckoo was noted. Three Australian Orioles were seen on 18th and 19th July, and Ibises were roosting in a tree near the house every night. Mr. A. G. Edquist reported that a Blue Mountain Parrot in captivity had laid four clutches this season. The first clutch was laid 11th and 13th March; second, dates not recorded; third, 21st and 23rd June; and fourth clutch, 14th and 16th July. It was noticed that the eggs gradually decreased in size. Master A. Lendon stated that a Pink Cockatoo laid 18 eggs in a cage in one year. Mr. C. H. A. Lienau described a finch unknown to him which he had recently acquired for his aviary. The bird appeared to be half way

between a masked and the long tailed finch. The same member also referred to the strange habit of a Landrail he had in captivity which would feign death when the cage was entered.

The President announced that Mr. Gregory M. Mathews had informed him that the British and American Ornithologists' Unions were about to compile a list of the birds of the world, and solicited the assistance of this Association. The meeting was in favour of assisting in this his work. Capt. White stated that the Tasmanian Government had invited him to go to Macquarie Island to enquire into and report upon the method of killing Penguins for the boiling down works, and that he had the matter under consideration. During the month the President addressed a well-attended meeting at One-tree Hill on bird protection, and the interest displayed by his hearers was very encouraging.

Mr. J. W. Mellor exhibited a specimen of *Acanthiza rosinae* taken by him at the mouth of the Port River in June, 1897. The same member also showed two Stubble Quail, a Double-banded Dotterel, and a Pipit, which had been killed through collision with telegraph wires.

Consideration of the *Acanthizas* was continued, the species discussed being *Acanthiza iredalei* and *Geobasilus chrysorrhoea*. Specimens were exhibited by Capt. White, and Messrs. J. W. Mellor and F. E. Parsons.

30TH AUGUST, 1918.

Capt. S. A. White presided over a large attendance. Mr. J. Gordon Hastings and Master Alan Lendon were elected new members. The Hon. Secretary (Mr. F. Angel) stated that the Executive Committee had appointed a sub-committee to deal with the nomenclature work for Mr. G. M. Mathews. A discussion took place in reference to the new Bird Protection Bill, notice of which had been given in the House of Assembly. The Chairman spoke at length upon the necessity for a new Act, owing to the faulty existing measure. It was unanimously agreed that a letter of thanks should be forwarded to the Attorney-General and Mr. Geo. Laffer, M.P. for the interest they had taken in this matter, and for the proposed introduction of the much needed Bill. Many bird observations were recorded for the month. Mr. A. Crompton recorded that Landrails had been seen to sit or roost in orange trees at Stonyfell eight or nine feet from the ground, this being a most remarkable occurrence, and was supposed by members to be due to the danger of destruction by the fox. Dr. Morgan reported having heard the reed bird, this being an early date for it to make an appearance. The doctor also noti-

fied having seen fully fledged young of the Brush Wattle Bird. Mr. J. W. Mellor said that he had seen 30 swan flying low down from the north towards Glenelg; also that he had witnessed 12 Pelicans on the wing. The Narrow Billed Cuckoo had been calling, and the White-faced Herons were nesting in the big gums at Lockleys. Mr. Zietz also reported having heard many Swan and Plover passing over at night time. Miss Edwards stated that she had noticed 16 White-faced Herons at Hazelwood Park. Mr. Belchambers forwarded interesting bird notes. The Chairman said a pair of New Holland Honey-eaters had hatched young. Swallows had been seen carrying nesting material. A Boobook Owl had been roosting in the day time over a woodheap where a man was cutting wood almost every day, within six feet of the bird, chips flying around it. Finches from Western Australia, and which Mr. Lienau had in captivity, were also exhibited. Mr. Lienau gave an interesting account of a trip to Victoria among the birds of the Dandenong Ranges, including the Lyre Birds.

Mr. Zietz exhibited the skin of one of the finches referred to at the previous meeting by Mr. C. H. A. Lienau. He also exhibited specimens of the Masked Finch (*Neopoeophila personata*), and the Long-tailed Finch (*Poeophila acuticauda*) for comparison. Mr. Zietz read a description of the above bird, and pointed out the chief distinguishing features between it and the two latter birds, but for want of certain literature was unable to complete his paper for publication.

Order Psittaciformes, Family Loriidae, Genus *Glossopsitta*.

Glossopsitta porphyrocephala Dietrichsen (Purple-crowned Lorikeet).

Description. — Frontal band and lores, shading from yellow to deep red; ear coverts, red tipped with yellow; back of the head and neck, bright green shading into yellowish brown on the back; crown of the head very dark purple; wing and tail coverts as well as rump, bright grass green; inside wing, crimson; shoulder, light blue; primaries, blackish brown, margined externally with bright green, edged with yellow; tail, green on upper surface, yellow beneath; throat and under surface, bluish green.

with orange and red markings on flanks; under tail coverts, green; iris, brown; feet, ashy grey; bill, black.

Measurements.—In the flesh, total length, 180 m.m.; wing from body to tip, 136 m.m.; spread, 305 m.m.; tarsus, 12 m.m.; bill, 12 m.m. Little or no difference in sexes.

Distribution.—New South Wales, Victoria, South Australia, including Kangaroo Island. The bird found in West Australia has been separated into a sub-species.

Habits.—Noisy, gregarious birds. Of the Lorikeets in South Australia this is the best known for it congregates in great flocks at times, and shifts about according to food supply; when the Eucalypts have finished blooming in one district these birds will disappear and find trees in blossom at a great distance. Just before dark they will start off for a fast fly, rising and falling, twisting and turning on very swift wing, then circle back to where they started from and dart into their favourite roosting tree for the night.

Nest.—No nest is made, the two to five round white eggs are laid on the bare wood of a hollow limb, hundreds of pairs nesting at times in the one locality, taking possession of all the hollow limbs of the Eucalypts for quite a distance round. Nesting season varies in different localities, from August to November.

Eggs.—The eggs are quite white, and rounded in shape. Average measurement of eleven eggs, 2.13 c.m. x 1.77 c.m.; largest egg, 2.15 x 1.80; smallest egg, 2.0 x 1.70.

Flight.—Very swift and long sustained.

Food.—Consisting of honey, varied at times by the seeds of Eucalypts.

Note.—Very shrill and piercing. All the time these birds are feeding, crawling from one blossom to another, or hanging head downwards they are giving forth their shrill calls. They also call a great deal when upon the wing.

Habitat.—They will be found wherever the trees are in blossom, be it open timber country or thick forest, and are to be found more often than not with other members of the brush-tongued parrots.

Birds of the North and North-West of Australia.

From Skins and Notes by the late Capt. T. H. Bowyer-Bower.

BY GREGORY M. MATHEWS, F.R.S.E., F.L.S., M.B.O.U., ETC.

No. 16.

280. *LICHENOSTOMUS PLUMULUS PLANASI*. Yellow-necked Honey-eater.

Ptilotus planasi (Campbell). Emu. Vol. X., p. 168, 1912.

Napier, Broome Bay, North-West Australia.

No. 97—♀. Length, 5.7 inches (5/6/86).

Irides, dark brown; bill, brown; basal portion of lower mandible, flesh colour; legs and feet, fleshy brown.

280. *PTILOTLULA FLAVESCENS FLAVESCENS*. Yellow-tinted Honey-eater.

Ptilotis flavescens (Gould), Proc. Zool. Soc. (Lond.), 1839, p. 144, 1840. Derby, North-West Australia.

No. 264—♀. Length, 5.6 inches (16/7/86).

No. 294—♂. Length, 6.1 inches (8/9/86).

No. 420.—♀. Length, 5.7 inches (21/10/86).

No. 310—♀. Length, 5.3 inches (24/7/86).

No. 513. Length, 5.4 inches (4/11/86.)

228. *STOMIOPERA UNICOLOR DARBISKI*. Western White-gaped Honey-eater.

Ptilotis unicolor darbiski (Mathews). Nov. Zool., Vol. XVIII., p. 413, 1912. Fitzroy River, North-west Australia.

No. 230—♀. Length, 7.8 inches (29/8/86).

Irides, grey; bill, dark brown; gape and space on the upper mandible, yellowish white; legs and feet, lead colour.

No. 239—♂. (29/8/86).

No. 261—♀. Length, 7.8 inches (2/9/86).

No. 277—♀. Length, 8.2 inches (5/9/86).

No. 278—♀. Length, 8.1 inches (5/9/86).

No. 288—♂. Length, 8.2 inches (7/9/86).

287. *MYZANTHA FLAVIGULA LUTEA*. Yellow Minah.

Myzantha lutea (Gould), Proc. Zool. Soc. (Lond.), 1839, p. 144, 1840. Derby, North-West Australia.

No. 403—♂. Length, 9. inches (13/10/86).

Irides, bluish slate, shaded next the pupil with brown; eyelid, brown, naked skin under and behind the eye of a bluish tinge anteriorly, then shaded with yellow and posteriorly becoming greenish white; bill, pale yellow, becoming lighter at

the base of the bill which is very fleshy; legs and feet, greenish ochre.

No. 404—♂. Length, 10.7 inches.

Irides, pale grey; skin round the eye, bluish white on the under part, remainder, bright yellow; bill, bright deep yellow, brightest at the base and gape, which is fleshy, and on the skin, which covers the bones of the bill (that is the forks); legs and feet, ochre.

No. 486—♂. Length, 11. inches (2/11/86).

No. 506—♂. Length, 10. inches (4/11/86).

No. 508—♀. Length, 10. inches (4/11/86).

No. 509—♂. Length, inches (4/11/86).

No. 512—♀. Length, 9.8 inches (4/11/86).

No. 514—♀. Length, 10.4 inches (4/11/86).

291. *PHILEMON ARGENTICEPS ARGENTICEPS*. Silvery-crowned Friar Bird.

Tropidorhynchus argenticeps (Gould), Proc. Zool. Soc. (Lond.), 1839, p. 144, 1840. Port Essington, Northern Territory.

No. 160—♂. Length, 13.5 inches. Palmerston (8/5/86).

Bill, black; face tinged with bluish lead; legs, lead colour.

293. *MICROPHALEMON ORIENTALIS OCCIDENTALIS*. Western Yellow throated Friar Bird.

Philemon occidentalis (Ramsay), Proc. Linn. Soc., N.S.W., Ser II., Vol. II., p. 676, 1888. Derby, North-west Australia.

No. 25—♂. Length, 11.7 inches (18/5/86).

Irides, black; bill, black; naked skin, bluish black; legs, grey. This bird imitates the notes of the Bower Bird exactly.

296. *MYRAFRA JAVANICA SUBRUFESCENS*. North-western Bush Lark.

Mirafra javanica subrufescens (Mathews), Nov. Zool., Vol. XVIII., p. 426, 1912. North-west Australia.

No. 130. Length, 5.8 inches (15/6/86).

Irides, brown; upper mandible, brown, yellowish white at the base and along the cutting edges; lower, fleshy white at the base, brown at the tips; legs and feet, fleshy white.

No. 229. Length, 5.8 inches (7/7/86).

Irides, brown.

298. *TAENIOPYGIA CASTANOTIS ROEBUCKI*. Dark Chestnut-eared Finch.

Zonaeginthus castonotis roebucki (Mathews), Austr. Av. Rec. Vol. I., p. 193. Roebuck Bay, North-west Australia.

No. 215—♂. Length, 4.4 inches (2/7/13).

- No. 369—♂. Length, 4.35 (3/8/86).
 No. 370—♀. Length, 4.35 inches (3/8/86).
 No. 379—♂. Length, 4.5 inches (6/8/86).

299. STIZOPTERA BICHENOVII ANNULOSA. Black-ringed Finch.
Amadina Annulosa (Gould), Proc. Zool. Soc. (Lond), 1839,
 p. 143. North-west Australia.

- No. 345—♂. Length, 4.5 inches (18/9/86).
 No. 346—♀. Length, 4.6 inches (18/9/86).
 No. 399—♀. Length, 4.3 inches (13/10/86).

Bill, lavender, darker at the base; legs and feet, lead colour.

- No. 400—♀. Length, 4.3 inches (13/10/86).
 No. 401—♀. Length, 4.35 inches (13/10/86).

301. HETEROMUNIA PECTORALIS PECTORALIS. White-breasted Finch.

Amadina pectoralis (Gould), Proc. Zool. Soc. (Lond.), 1840, p. 127, 1841. North-west Australia.

- No. 132—♂. Length 4.9 inches (15/6/86).

Irides, brown; bill, bluish black; legs and feet, light brown, darker in colour on the latter.

- No. 134—♂. Length, 4.9 inches (15/6/86).

These birds live amongst the swampy ground, flying from the grass to a kind of tea-tree.

302. BATHILDA RUFICAUDA SUBCLARESCENS. North-western Red-faced Finch.

Aegintha ruficauda subclarescens (Mathews), Nov. Zool., Vol. XVIII., p. 431, 1912. Parry's Creek, North-west Australia.

- No. 281—♀. Length, 4.5 inches (19/7/86).

Irides, orange-yellow; bill, reddish-brown, brighter on the lower mandible and darker on the culmen; legs and feet, ochre.

- No. 282—♂. Length, 4.5 inches (19/7/86).

Irides, bright orange yellow; bill, fleshy red; legs and feet, ochre.

- No. 297—♀. Length, 4.8 inches (10/9/86).

Irides, light orange; bill, red; legs and feet, pale yellowish.

- No. 299—♀. Length, 4.6 inches (10/9/86).

- No. 374—♂. Length, 4.6 inches (27/9/86).

- No. 362—♂. Length, 4.8 inches (3/8/86).

- No. 375—♀. Length, 4.8 inches (27/9/86).

- No. 363—♂. Length, 4.9 inches (3/8/86).

303. *POEPHILA ACUTICAUDA ACUTICAUDA*. Long-tailed Finch.
Amadina acuticauda (Gould), Proc. Zool. Soc. (Lond.),
 1839, p. 143, 1840. Derby, North-west Australia.
 No. 28—♀. (8/5/86).
 No. 98—♀. Length, 6. inches (5/6/86).
 Irides, light reddish-brown; bill, yellow; legs and feet,
 coral red.
 No. 100—♂. Length, 7.1 inches (5/6/86).
 No. 101—♀. Length, 4.8 inches (5/6/86).
 Irides, reddish-brown; bill, yellowish flesh colour; legs and
 feet, flesh-colour.
 No. 133—♂. Length, 6.8 inches (15/6/86).
 No. 169—♂. Length, 5. inches (22/6/86).
 Tail feathers not developed.
 No. 435—♂. Length, 6.8 inches (25/10/86).
 No. 436—♂. Length, 6.4 inches (25/10/86).
 No. 494. Length, 6.3 inches (2/11/86).
304. *NEOCHMIA PHAETON FITZROYI*. Western Crimson Finch.
Neochmia phaeton fitzroyi (Mathews), Austral Av. Rec.,
 Vol. I., p. 120, 1912. Fitzroy River, North-west Australia.
 No. 307—♂. Length, 5.5 inches (12/9/86).
 Irides, ochre; bill, crimson, with a pinkish white line at the
 base of both mandibles; tarsi, ochre; feet, light yellowish-
 brown; claws, transparent brown.
 No. 347—♂. Length, 5.5 inches (19/9/86).
 No. 348. Length. 5.5 inches (19/9/86).
 No. 433. Length, 6. inches 24/10/86).
 Lives in pampas-like grass, growing not far from the banks
 of the rivers. They are generally seen in small flocks of about
 ten.
305. *MIMETA SAGITTATA BLAAUWI*. North-western Oriol.
Oriolus sagittatus blaauwi (Mathews), Nov. Zool, Vol.
 XVIII., p. 435, 1912.
 Napier, Broome Bay, North-west Australia.
 No. 40—♀. (24/5/86).
 Irides and bill, brown; legs, bluish lead-colour.
311. *ROGERSORNIS NUCHALIS OWENI*. Western Great Bower
 Bird.
Chlamydera nuchalis oweni (Mathews), Nov. Zool., Vol.
 XVIII., p. 440, 1912. Point Torment, North-west Australia.
 No. 313—♀. Length, 14.4 inches (13/9/86).
 No. 386—♂. Length, 15.5 inches (10/10/86).
 No. 388—♂. Length, 15.3 inches (9/8/86).

Irides, brown; bill, brown; inside of nostrils, fine yellow, inside of bill, white, becoming light yellow round the swallow; legs and feet, olive brown, lighter at the bottom of each scale or the tarsi.

No. 389—♂. Length, 15.3 inches (9/8/86).

Irides, brown; bill, brown; much lighter at the tip of both mandibles, the inside of the nostrils light dirty yellow, inside of bill, orange, brightest round the swallow; legs and feet, olive; lighter and brighter at the bottom of the scales on both tarsi and foot.

No. 373—♂. Length, 16. inches 6/8/86).

Irides, dark brown, lighter round the pupil; bill, dark brownish olive, inside of bill, yellowish white; legs and feet, dark olive.

The bower was built under a thick bush, which was pulled down by the bird after being visited. At one end was a small collection of bones, at the other charcoal. The birds feed on the reddish blackberry which grows on a small bush.

314. CORVUS CECILAE. Northern Crow.

Corvus coronoides cecilae (Mathews), Nov. Zool., Vol. XVIII., p. 442, 1912. Napier Broome Bay, North-west Australia.

No. 34—♀. Length, 18.4 inches (30/7/86).

Irides, brown, with an outer circle of pale grey; bill, legs, and feet, black. Another bird had the irides particoloured, that is, brown next the pupil and white outside.

Notes upon the Black-breasted Plover

(*Zonifer tricolor*, Vieillot).

(BY S.A. WHITE, C.M.B.O.U.)

The Black-breasted Plover is widely distributed, being found all over Australia with the exception of the tropical parts. It also inhabits Tasmania, Kangaroo Island, and the Islands of Bass Straits. This bird's presence is soon known by its far-reaching, but musical note, which is given both upon the wing and on the ground; it moves over the ground in series of short runs, pausing in between. It was once very numerous upon the Adelaide Plains, especially here at the Reed-beds, where it is still to be seen, but not in such numbers as in the days gone by.

Still a few pairs nest every season upon my property, and I give them all the protection within my power. The Black-breasted Plover is one of our most useful birds, for it lives almost entirely upon insect life. Although found very often upon low swampy country it does not confine itself to this habitat for it can be seen in all manner of places, I have met with it in the dry interior, upon fallow land, in grassy valleys of the Ranges, and on the stony tableland country, as well as on the vast expanses of dry sand.

I do not look upon this bird as a migrant, but as one which shifts from place to place according to the food supply. I have noticed that it is very plentiful when crickets and grasshoppers are abundant.

It is a very intelligent bird, knowing when it is protected, and becoming very confident and tame under these conditions. Next to man the fox is now its greatest enemy, and there is no doubt great numbers of birds and their eggs fall victims to the wily fox, who works the ground systematically for their nests. The Plover moves about both by day and night, and it must take much of its food at night time, when many noxious insects are abroad. It is a very wary bird when molested, and can detect the approach of human beings long before they are seen, and will give the warning call, very much after the manner of the Spurwing (*Lobibyx novae-hollandiae*). The Black-breasted Plover is often heard at night, flying high, it is no doubt then shifting its quarters. Yet I have known this bird to remain within the radius of a mile for many months, and long after it has brought out its brood; it moves about as a rule in parties of ten or a dozen, but I have seen over thirty at times.

The eggs are from three to four in number, but in dry seasons I have known it to incubate two eggs; at times the eggs are laid on the bare ground without the semblance of a nest, while at others a few sticks or stones are placed around the eggs. Yet again, in rare instances a snug nest is formed of dry grass and rootlets.

The accompanying photographs illustrate the last two cases, in the one with three eggs a few sticks are placed around, in the other the nest was made in the centre of an old dry flattened out lump of horse manure, and the eggs were difficult to detect. It is an early breeder, for I have often seen nests in June, and in the case of the illustration of the four eggs, they were well incubated when seen on July 3rd. The young leave the nest very soon after being hatched, and they are of a dull brownish black in colour, and so like the earth on which



Black-breasted Plover (*Zonifer tricolor*) brooding on eggs.

S. A. White, Photo.



Eggs of the Black-breasted Plover (*Zonifer tricolor*)

S. A. White, Photo.



Black-breasted Plover's Nest in dry lumps of horse manure.

S. A. White, Photo.

they squat at the slightest sign of danger, that it is almost impossible to pick them out unless they move. The old birds are very cunning in their efforts to draw the attention of the intruder from their nest, and will sometimes fly straight at one, when well away from the nest, to make believe the nest is close handy.

Notes upon the Brush Wattle Bird

(*Anthochaera chrysoptera intermedia*).

(By J. W. MELLOR, R.A.O.U.)

[The following Notes came to hand too late to be included in the description given of this bird in the last number. Ed. Committee.]

A comparatively few years ago the Brush Wattle Bird was only an occasional visitor to the Reedbeds, coming for a short time only, and then departing; but about ten or twelve years ago a pair took up their quarters in our front garden at Fulham and nested. They were strictly protected, and from then onward they have kept with us throughout the year, and so increased that they are now quite a common bird, and each year several pairs breed in the garden or orchard, they prefer an orange or lemon tree to any other, although they do not keep to these trees, they place their nest quite close to where we are working the ground, and sit upon their nest until any one passes close to them, then they merely slip off to a neighbouring tree or bush, and back again in a few minutes. The clutch is invariably two eggs here, but in other parts I have found occasionally three eggs, I have known a pair to start early, and end late in their domestic duties, and bring up three broods. The young are seen about in the trees near to where they were bred, and feed on insects, etc., although the food of the old birds consists chiefly of honey obtained from the flowers. The young for some time after leaving the nest make a peculiar plaintive squeaking note while being fed. I have noticed them both in the hills and plains country, but always when it is well bushed, as they are not long flyers, merely going from tree to tree. They are very noisy birds, especially in the spring time, when the eucalypts are in blossom, and like other members of the family, will drive all other birds from a particular feeding tree. Their call is a harsh guttural one uttered often when in a tree, but not upon the wing.

Review : "Re-naming Australian Birds—Is it Necessary?"

BY A. J. CAMPBELL, C.M.B.O.U.

Delivered at a *Conversazione* of the Royal Australasian Ornithologists' Union, Melbourne, July 3rd, 1918 (Walker, May and Co., Melbourne).

Reached the Hon. Secretary and has been handed to me for comments. I know my old friend's very conservative views upon "Nomenclature", and I also know the good work he has done in the past on Australian Ornithology, still Mr. Campbell's address cannot be taken seriously, because his aim seems to be, to make an ornithology for Australia to the exclusion of the Old World. If this be the case no scientific ornithologist could work along those lines. In opening, Mr. Campbell says—"Nomenclature is not a science." I do not agree with this, for the naming of birds with scientific names can only be done by scientific ornithologists, therefore it must be science. Then Mr. Campbell goes on with a lot of things which have nothing to do with either ornithology or science; I refer to such statements as "Official circles of Army, Navy, Civil Service: Let the dead bury their dead, etc., etc.," but one sentence is interesting, it is "Again in every walk of life many of us do not receive the reward we fancy we should." This is no reason why we should not give those men before Gould's time the honour which is due to them. Mr. Campbell quotes, "The excellence and correctness of the major works such as John Gould's "The Catalogue of Birds." As to the first John Gould says in his "Hand Book of the Birds of Australia", "Modern research having ascertained that many of the species believed at the time I wrote to be new, had been previously described by Latham and others, the specific names assigned to them by those authors have, in obedience to the *Law of Priority* been restored." As for the catalogue, the B.O.U. is now at work upon a list of the Birds of the World, which looks very much as if a new list is badly wanted. As for the market value of these old works, it is their age and excellence of finish which gives them the values quoted by Mr. Campbell. No progressive ornithologist works by Gould now, for apart from his real types his work is obsolete, and has not Mr. Campbell said so, for he has written in the preface of his fine work "The Nests and Eggs of Australian Birds". "*Since Gould's day ornithology, like every other science, has advanced a pace, conse-*

quently Gould's classification is somewhat obsolete." In reference to "The National Rules of Zoological Nomenclature" Mr. Campbell asks, "Who has copies of these rules in the Commonwealth?" Should any one break an act of the law, it would be no excuse to say one did not read the act. The same with the ornithologist, if he does not keep abreast of the literature on the subject, ornithology will not wait for him, and he will be left behind. The next question is, "Who made them?" (the rules). These rules were made by the most eminent zoologists of the world, and as for Australia taking part in forming the rules, I would be very much surprised if such savants who composed the Committee, would think of including an Australian ornithologist after the class of ornithology which has been expounded in Australia. That the Law of Priority should suit one branch of zoology and not another is not in the least consistent. If *The Emu*, as Mr. Campbell says, is "to popularize the study of our native birds", and not to contain scientific matter, the union will suffer; for it will become a bird lovers' club. How many of Gould's children who were born in Australia have nothing to do with nomenclature, nor has sentiment anything to do with science. John Gould did good work in Australia, he was a very shrewd business man, and made his work pay. No man gave less credit to some who helped him beyond measure in Australia. Mr. Campbell speaks of assistants who took up the work for payment, but not a word about a great field ornithologist who spent thousands, put up with great hardships, took more than one trip to England to help the author of "The Birds of Australia" in his work, with notes and material which never cost John Gould a penny, and this man was hardly mentioned in the big work. Surely Mr. Campbell must know that the rulings of the International Congress are for the world and that all scientific ornithologists over the face of the globe must work by them. If Mr. Campbell means that the so called Official Check-list when he says "Australian Ornithologists in taking Gould, are precisely on the same footing and adopting the same rule as did the old world ornithologists in regard to the Xth Linnaeus," all I can say is that, I had better give the reviews of the leading ornithological journals upon that list. *The Auk*, vol xxx., p. 447, 1913, says—"These principles we think constitute the most remarkable code of nomenclature that has been framed in recent times. . . . The members seem to have failed utterly in comprehending the problem before them. We regret exceedingly that we cannot endorse this check-list for general use. Aside from all ques-

tions of nomenclature it would serve a valuable purpose as a conservative list of Australian species and sub-species, but here it fails inasmuch as the lack of synonymy makes it difficult or impossible to ascertain with which the many recently described races have been united." Then again *The Ibis*, 1913, pp. 669 to 701 says—"It is impossible to recommend the list to the use of present day workers, as no synonymy is given, and names are apparently used for species with which they have been shown to have no connection. In conclusion it can only be reiterated that the Official Check-list can be regarded merely as an expression of the conservative views of the old school of Australian Ornithologists, and not as a useful index to that of Ornithological Science in Australia."

The International Committee on Zoological Nomenclature is steadily confirming or rejecting names. The Law of Priority has been affirmed both in 1892 and 1901.

All ornithologists in this State are of one mind that "The vexed question of Nomenclature" must be settled now, once and for all. What we have to do is, set to work (the sooner the better), and form a list of Australian birds upon the foundation laid down by the most eminent men in the Ornithological World.

S. A. WHITE, "Wetunga",
September, 1918. Fulham. S.A.

Bird Notes.

(From the McGilp Bros., Moolawatana Station.)

AUSTRALIAN DOTTEREL (*Peltohyas australis*).

On 22nd of June we were motoring on the plains east of here, and nearly ran down a dotterel. After pulling up we had no difficulty in finding the nest, which contained three eggs, quite fresh, the usual clutch. We were surprised to find the bird had made a nest, for we had never observed more than a small hole scraped out, and the eggs laid therein, and sometimes covered with earth and small twigs. On this occasion the bird had built a very artistic nest. It is well known that after water dries up on the clay pans the silt when drying curls slightly in small pieces. The bird had gone to some trouble to collect these pieces, and after scooping out the usual hole, had placed the curly pieces around, to a height of at least 1½ inches above ground line. Among the collected pieces were a few small twigs and a good deal of half dry grass and herbage, the whole making a beautiful nest and, the first we have seen.

On Wednesday my brother and I took a trip to the Salt Lakes to see if the swan were nesting, the lake was covered with

swan and numerous species of ducks. We found scores of swans' nests, but the blacks (half castes) had robbed nearly all of their contents only two were seen with seven eggs in each. It seems a shame that so many of these beautiful birds should have their eggs taken. The coloured people were shifted to a distant part of the run, and it is to be hoped that the swan will lay again and hatch out their young in peace.

The following notes were written by Mr. J. Neil McGilp in answer to a letter from S. A. White. Since reading your letter, re Kites, I do not think we have the Square-tailed Kite, we often get half a dozen in the fowl yard when they go after the scraps, but do not trouble the fowls; all appear to have a forked tail, but as mentioned before nearly square at times.

Yes the Little Eagle is here, not very plentiful, still one could not say rare. There is no mistaking this bird when once handled. It is an Eagle Hawk in miniature, the head especially so, and the feathers down to the feet. When seen on the wing this bird cannot be confused with others. The note is one shrill whistle, and I have only heard it used when chasing or being chased by other birds. This bird can be approached quite closely when nesting, at other times it is wary, and flies very high. Have you noticed that this bird seems to have a set on the Whistling Eagle. When the Little Eagle is about he or she will not let the Whistling Eagle alone, and swoops down on the resting bird, the latter bird often closes for a fight, but I have never seen any damage done. The Little Eagle does not appear to resent any other of the hawk family, and is often seen soaring contentedly round with Kites, Wedge-tailed Eagles, etc., but as soon as the Whistling Eagles get up, they invariably start chasing one another.

A Shell Parrot was observed to leave a White-browed Babbler nest; upon examination three Shell Parrot's eggs were found. Such a strange nesting place is often used, for the young have been noticed twenty to forty miles from hollow trees. Have you ever noticed Rose-breasted Cockatoos breeding in old rabbit warrens? My black boy pointed out a case a couple of years ago (about 30 miles from timber) when I found 3 eggs. These Cockatoos were close at hand all the time. I understand from my stockmen that they now and then flush these Galahs from holes in the ground.

A great many Pratincoles have visited us this year, but they did not stay long, and have now gone to other parts. Bee-eaters were in thousands in the Hamilton Creek during February and March.

ABOUT MEMBERS.

Every member of the Association, in fact every one in South Australia, and many outside its limits, were delighted to hear of the honour conferred by His Majesty The King on Mr. Thos. Gill, C.M.G., I.S.O. There is no better friend to secure than our honoured member. Not only has the Under Treasurer done a wonderful work for Science, but he has saved the State many hundreds of thousands of pounds sterling through his sound judgment. It is the sincere wish of all members of the Association that Mr. Gill may live for many years to enjoy the honours so richly deserved.

In a letter dated July 14th, 1918, and addressed to the President of the Association from Major R. W. Shufeldt, of the United States Army, says:—"I chanced into the rooms of the Bird Division of the Washington National Museum to work up some bird notes, when a very charming gentleman came in, in his shirt sleeves, and evidently up to his eyelids in work. Dr. Richmond introduced him to me as Mr. Edwin Ashby of South Australia. You can easily imagine all that followed. He gave me your kind note, and we chatted away for over an hour."

A Sketch of the Life of Samuel White— Ornithologist, Soldier, Sailor, and Explorer.

BY HIS SON, S. A. WHITE, C.M.B.O.U.

XVIII. THE ORNITHOLOGIST AND SAILOR.

In notes dated the 24th August my father writes:—

"To-day the men have been off cutting firewood. I went up to see Mr. Jardine and ascertained that one of his boats was going to Thursday Island to meet a steamer on her way to Sydney. This offered me an opportunity to write, so I came off to the yacht to do so. Weather very squally and the wind very strong at times. The 26th. Spent the morning with Mr. Jardine. He has kindly undertaken to take care of my craft if I wish to leave her for any time, and also to have a sheet of copper put all round her to secure her from marine insects. In the afternoon I set a couple of the men to clear out the port store room in order to get out a cask of meat; I then went on shore. Cockerell has gone off into the bush to stay a day or two. The weather has been moderately clear and

without rain, but the wind is still blowing hard. 26th: To-day I packed up many specimens, birds, and shells and spent the evening with Mr. Jardine. The weather is milder, but the wind is still strong and sky clear."

On Friday, 27th, my father seems to have had more trouble with his captain, and he ordered the anchor up, and made sail for Thursday Island, which was reached in a few hours. In company of Captain Pennefather, Samuel White went to the Senior Magistrate, and it was arranged that the captain and crew would come before the Bench next day. In a few notes written on the day my father says:—

"At the invitation of Captain Pennefather I went on board the Government Schooner 'Pearl.' This schooner is owned and kept by the Queensland Government, and has only recently been put into commission; she has been until recently the survey ship owned partly by the British Government after the manner of all the colonial survey ships. About a year ago she was in the market, and I was nearly purchasing her, but an unavoidable delay proved fatal. She is a schooner of about 50 tons measurement, carries two six pounder Armstrong guns, and appears to have a large native crew on board; she is kept for the regulation of the pearl fisheries, the settling of disputes, and a little exploring between times."

The next morning my father breakfasted with the Captain of the "Pearl," then appeared against his crew, who were sent down to Sydney. He seems to have let a Mr. Robb have all his ship stores, intending to get fresh supplies when he returned. There were some things which had to go into bond. It seems that the weather was so rough that nothing could be landed from the yacht, and Samuel White passed most of his time on his craft at anchor. On September 1st he writes:—"Spent most of the day on board; went to see Mr. Robb and arranged with him to store all my stuff. He will come himself and take it from the ship, put what he does not want into bond, and make use of the remainder for himself. Capt. Pennefather came on board, and I lent him my big swivel gun, and gave him a bag of shot and a bag of wads. I do not think I will get away this week." It seems that the yacht and owner remained in the same spot for another week. He could not get rid of his stores, so sold flour, sugar, rice, biscuits, rum, brandy, ale, beef, etc., etc., for £25, which cost £200, and the rest of stores were put into bond. Then he arranged with Mr. Jardine to send his men over to Thursday Island and take the yacht over to Cape York to be laid up. On the 15th Samuel White and his two taxidermists were

still waiting for the crew from Cape York to shift the yacht, and under the date my father writes:—"This morning I nailed down some boxes of specimens, and found that some of the boxes had been opened, and many of the specimens removed, and upon examination I found some one had been in my cabin, and taken most of my tortoiseshell and all my pearls. Thus I have been robbed by my crew from the time I started till they left me."

On the 26th of September Samuel White, with one taxidermist (Cockerell) boarded the Somerset bound down the coast, and the yacht was to sail for Cape York that day to be under the care of Mr. Jardine. Samuel White joined his wife in Sydney, and had only been there a few days when on the very day he arranged to purchase a home on north shore for his wife and family while he was away to finish his expedition, he caught a chill, inflammation set in, and on November 17th, 1880 there passed away one of (if not) the greatest field ornithologist the world has ever seen. He possessed a most kindly and loveable disposition, by far too good natured. He was a great musician, chemist, photographer, intrepid explorer, a keen soldier, a sailor as this brief sketch shows, but above all and in every sense of the word a Man.

Among my father's papers were some notes evidently written upon his last voyage from Thursday Island to Sydney; they were very brief, pointing to the fact that he intended enlarging upon them at a later date. The first notes deal with the islands on which my father collected the birds, he says:—"The Aru Islands consist of a great number of islands of all sizes. The largest are divided from each other by narrow channels holding salt water, and appear no more than rivers, or such was the appearance of those I was in. The names of the principal are Tragan on the south, Kobror, Maykor, Wokan, and Wamma. The last named is much the smallest, and most northerly, but is notable as containing the old trading village of "Dobbo", and is situated at the northern end of the group, which extends from north to south for about 100 miles. The islands are variously laid down and divided in different charts, and I believe the two admiralty charts that I have are quite wrong so far as they apply to the parts I have visited. Wallace's Chart at page 442 of his "Malay Archipelego" is by far the most correct, indeed had it not been for this map I should have been a long time finding the Watalli Channel, had I been in it I should not have known it by the Admiralty Charts, for it is quite absent from them. The land everywhere is very low and even swampy at this

time of the year. There is not one mountain in all the Arus. Had there been a hill of any size it could have been easily seen from the sea-ward. Tragan is the highest and most undulating, grassy patches of large extent can be seen along the west coast. The islands are composed of soft white stone which looks like limestone, in many parts quite bare, in others covered in black mud or mould, but not to any great depth, and of a vegetable nature, and very rich. Consequently there are no water wells, but water was running or lying everywhere. All along the west coast from end to end there was a good anchorage at this time of the year quite close in shore for a vessel drawing from 10 to 15 feet. The most southern of my anchorages was at the south end of Tragan; from this we dropped anchor in places all along and beyond the island of "Polo Babi", first a quarter of a mile from shore in four fathoms, next a mile from shore in seven fathoms, then a few hundreds of yards from shore in three and a half fathoms. Again at the village of Maykor a quarter of a mile from shore there was four fathoms, and at half a mile there was 15 fathoms. All through the Watalli Channel we bottomed at seven to sixteen fathoms. Along the coast the bottom was rock and sand, and in the channel it was bare soft rock, over which the chain rumbled when the tide changed; in one or two places soft mud was found. The beach all along the west coast was either sand or rock. Where sand occurred it was merely a bank covered with low dense vegetation, when over this, a low wet country begins, covered with dense tropical forest. A good deal of rock occurs along the shores of the bay, into which the Watalli Channel enters, and for want of a proper name I called it "Polo Babi Bay". Here the banks are not high, and once over them a low wet scrub is entered, wet at this time of the year, for rain falls nearly every day; but when a fine day or two comes along there is a great diminution in stream and pool, so that I have no doubt that in the drier part of the season the scrubs are quite dry and water scarce, but in July and August the climate is cool and moist, with abundance of water everywhere. There are no rivers, only small creeks, and then not deep, excepting when the salt water flows up them, and these are fringed with mangrove swamps. It was a great wonder to me that there were not more mosquitoes. They did not trouble us very much on board, only in the scrubs, and then not so badly as I have experienced them in many parts of Australia. Possibly they would be more troublesome from December to March.

"The people of the Arus who assisted me in collecting birds, especially the Great Bird of Paradise, are without doubt the most mixed of human beings. I had not the time to study these mixed races, but they appeared to be on the whole well made muscular men, especially those from the 'Blackangtauna' (bark country). They were taller and longer limbed men, with a greater number of beads and other ornaments about them, and a greater number of frizzly heads. They evidently had more of the Papuan blood in them. The Aru people are not black. Many are a pale brown, others somewhat darker. Many who lived on the Watalli Channel and in the interior had their hair cut short, while others wore it long and frizzly standing out all round, making a man's head the size of a half bushel measure! In some there seemed to be a slight skin disease, and some had their hands and spots about their bodies white, or spotted white and black; they did not appear dirty, but the big mop of hair in some instances was in a disgusting state. I saw some men with long frizzly hair tied up in a bunch on top or at the back of the head, which, I thought gave them a very feminine appearance, especially as little hair grew on their faces. Some old men were seen with short stubbly beards, but the majority had little or no beard. I noticed several men who had one or more moles or spots on various parts of their faces, out of each mole grew several hairs; these seemed to be cultivated till they had reached several inches in length, this being the only hair upon their faces. Most of the men go nearly naked, having nothing to cover them but a long narrow strip of coloured calico round the waist and brought up between the thighs. The Malay or Macassar men are mostly draped in loose folds of calico. There is a great difference in character also between the Malay and the Aru men. The former is diffident, docile, and not given to talking, shows little expression on his face, rarely smiles; indeed some look so solemn that one would think it were a serious thing to live. The Aru men are the contrary, for they are talkative, even boisterous and impulsive, they will sing to themselves, and always chant a song while paddling often to the music of a tom tom or a gong, they thronged the yacht all day long, packed themselves as closely as they could stand, and would not move for anyone to pass until their toes were trodden upon. They pulled everything about, and watched with attention everything that was going on. At meals every mouthful and every movement was taken note of, much to the annoyance of my father, officers and crew; they all talked at once and incessantly as loud as they

could yelp, hoot and yell at each other till nothing else can be heard, but their greatest redeeming quality is honesty. Although this crowding went on for weeks, and many things lying about which must have been a great temptation, yet nothing was missed but a hand lead and line which some of the crew accused the natives of taking, but I am confident they did not take it, and thought I heard it fall into the water. They did not take a pin or a piece of paper without asking for it. They are as a whole strictly honest, and although they are but savages they are a pattern for their more enlightened brothers. A good many of the Aru men speak Malay so that I was able to get along with them very well as I learnt a good deal of the Aru language as well. One could not say that they are industrious, although they work plantations, but like all savages are idle, their greatest pleasure being chewing and talking. They chew "Beetel Nut" lime and green leaves sometimes mixed with a little tobacco if they can get it, and carry this chewing to a great excess. I am afraid they would be great drinkers if they could get it, as I have been asked for "Sopi" (spirit) hundreds of times. Some men have refused everything else in exchange for birds, but I hardly ever indulged them, without it be a chief, and never in exchange for anything else. Their homes are good passable structures, always built on piles raised from the ground five or six feet, have a split bamboo floor, and an opening through the centre as an entrance. The sides are usually of mats, and the roof thatched with palm leaves. The only ornaments seen in the houses were trophies of the chase, such as cassowaries' feathers and bones, fish tails, bird feathers, etc. The utensils for preparing food and holding water, etc., were rough clay pots. Some with very wide mouths in shape much like the old three legged iron pot; in these they boil their food. Gaudy coloured plates and basins were seen, but these came from Dobbo. Many families had a copper or brass gong. Some of the houses are large, being 30 feet long, and several families dwell in them. The villages are small, consisting of one to three or four houses, scattered anywhere from the coast to the interior. Their plantations are all well fenced with spars laid on their sides about two inches apart, and three or four feet high; this is to keep wild pigs out. In many places they construct pig traps by making little shoots or leads with stakes driven into the ground and a cross piece lashed along the top with rattan, the lead is about five or six yards at the entrance, and about a foot or less at the other end. A pig on the outside would if tempted by the green

vegetables inside easily find his way in at the wide end of the lead, and when once inside would not find the small opening to return. For these plantations a piece of land is selected which had more than ordinary depth of soil, it is of course in the midst of a dense tropical scrub. The land is partially cleared by cutting down most of the trees and leaving them lying on the ground to decay away. The crop is then put in the virgin soil among this labyrinth of tree trunks and grows luxuriantly, it consists of sweet potatoes, yams, sugar cane, etc., and sometimes, not always, bananas. The cocoanut grows anywhere without clearing for it, but this tree requires from five to ten years to come into full bearing. At the time Wallace visited the Aru Islands cocoanuts were not known, but there are a great many full grown trees now. The natives do not care to part with the nuts; they ask an enormous price for them, or indeed for any of their products. Bananas are as dear if not more so than in Australia. I have seen several kinds of bananas growing in the plantations when out in search of birds. The milk of the young cocoanut forms a delicious and wholesome drink, but it is not often one can indulge oneself in the Aru Islands. Besides their vegetable foods the natives obtain large quantities of fish. They catch them in small nets, but more frequently by spearing them at night by torch light. Then the men and boys are good archers, and shoot numbers of birds, now and again a wallaby, and upon rare occasions a pig; they also snare the terrestrial birds as well as mammals. The men and boys always have bows and arrows with them. When rambling through the bush I have on several occasions not known my exact whereabouts. This is very easily managed when the sun is so often obscured by heavy clouds, and every yard of that country is dense bush. Coming suddenly upon a village or hut I would ask one of the men to put me in the right direction; that he would do without a moment's hesitation, and if he only had to go twenty yards he would bring his bow and arrows and mat. This mat is an extremely useful article; it is made of the leaves of the pandanus palm, neatly sewn together three or four thick, it is about four feet by three, is doubled once, and the end sewn up so that it is like a sack with the top and one side open. This mat then forms the men's seat or bed, it is very soft, should it rain he can open it out and put it over his head, when it will cover the head, shoulders, and back, and no rain will go through it, if it is cold he does the same, or if the sun shines too hotly he can make an umbrella of it. The boys shoot well with their arrows,

and brought dozens of birds to me which had been shot with blunt headed arrows. Have frequently tried their skill. They will hit a biscuit at twenty yards almost every shot. The natives are fond of shooting with a gun also, but they rarely can get ammunition. Some of them have old flint muskets. They were awestricken when the breach-loaders were first shown them. While at Wanumbi they would not leave the guns alone. As soon as they were put down one of the natives had them and was pulling them about showing and explaining to the rest; often I had to send my fifty guinea gun off to the yacht as it was not safe to allow such inexperienced people to handle it.

SOUTH AUSTRALIAN ORNITHOLOGICAL ASSOCIATION.

Patron—

Hon. Sir George Murray, K.C.M.G., Murray Park, Magill.

OFFICERS FOR THE YEAR 1918.

President—Capt. S. A. White C.M.B.O.U., "Wetunga", Fulham.

Vice President—Edwin Ashby, M.B.O.U., "Wittunga", Blackwood.

Secretary—Robert Crompton, On Active Service.

Acting Secretary—F. M. Angel, C/o. W. D. & H. O. Wills, 113 Grenfell Street, Adelaide.

Editorial Committee—

R. Crompton, On Active Service.

A. G. Edquist, King Street, Mile End.

Capt. S. A. White, "Wetunga", Fulham.

F. R. Zietz, Museum, North Terrace, Adelaide.

Honorary Member—

Mathews, Gregory M., F.R.S.E., F.L.S., etc., Foulis Court, Fair Oak, Hants, England.

Other Members—

Barritt, E., Ruthven Mansions, Pulteney Street, Adelaide.

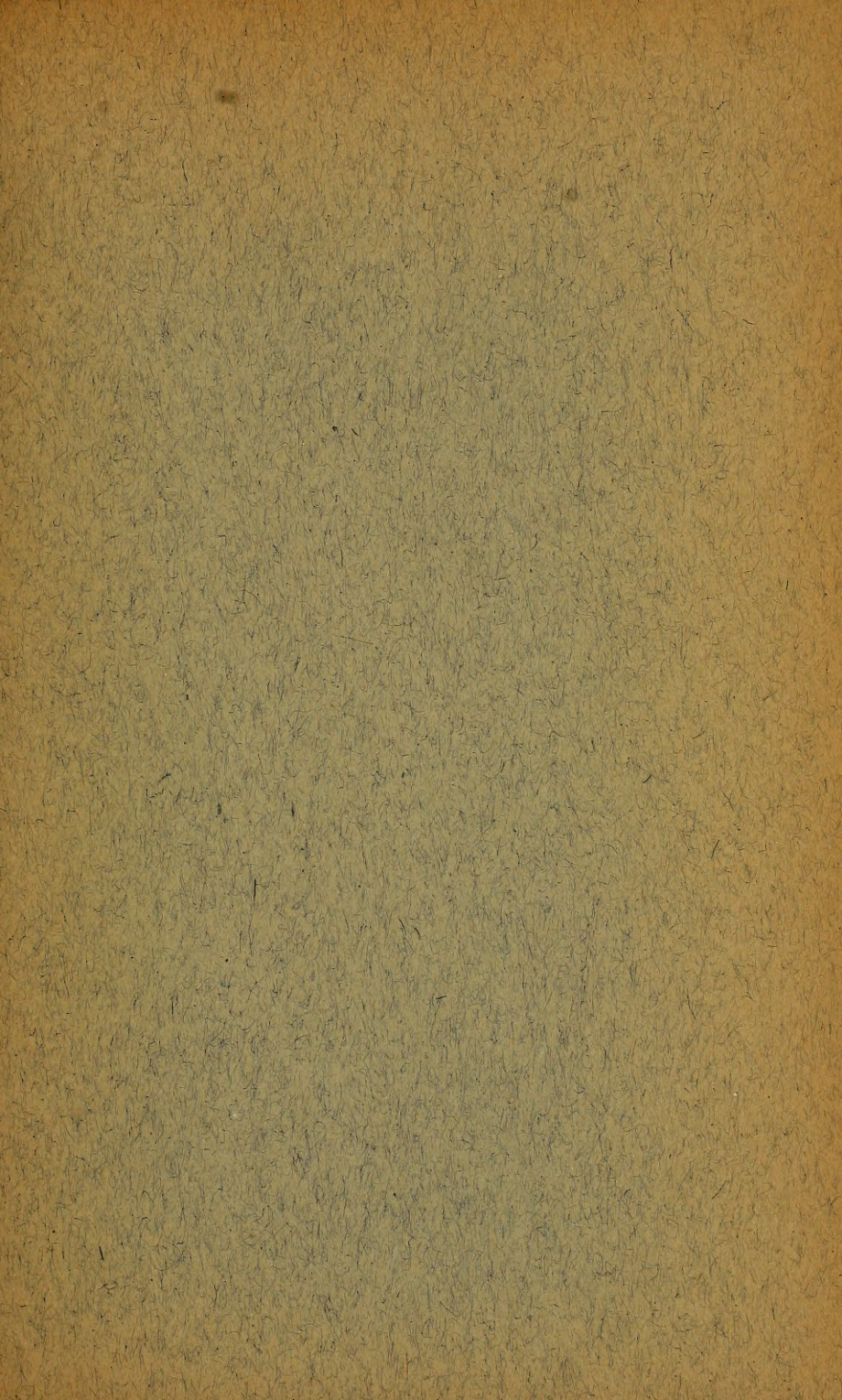
Crompton, A., Statenborough Street, Upper Kensington.

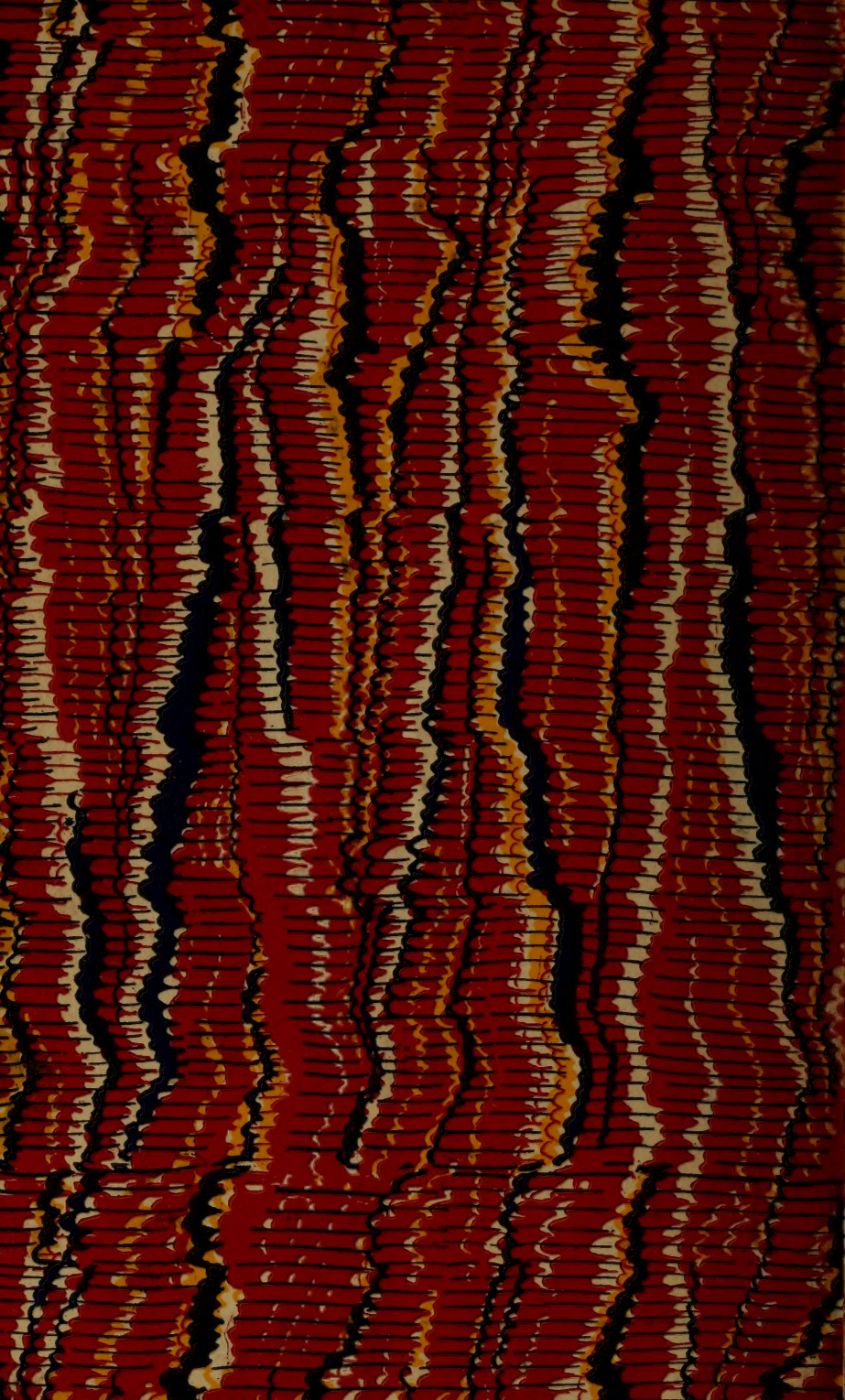
Clark, M. S., Third Street, Knightsbridge.

Connor, J. D., Barnard Street, North Adelaide.

- Chenery, Dr. A., Wentworth, N.S.W.
Dutton, H. H., "Anlaby", Kapunda.
Edwards, Miss, Tranmere School, Coryton.
Fisher, H., "Montefiore", North Adelaide.
Gill, Thos., I.S.O., C.M.G., Woodley Road, Glen Osmond.
Hughes, Harold, Gladstone.
Hawker, R. M., 9 Currie Chambers, Currie Street, Adelaide.
Hawker, M. S., Adelaide Club, North Terrace, Adelaide.
Henderson, B., On Active Service.
Henderson, Robt., Barton Terrace West, North Adelaide.
Hosking, J. W., 47 Parade, Norwood.
Harman, Miss, Tranmere School, Coryton.
Hastings, J. G., McGrath's Flat.
Ifould, Percy, C/o. John Dunstan & Sons, Ltd., Waterfall
Gulley, Burnside.
Jury, Mounted Constable L., Edithburgh.
Laffer, H. E., Viticulture Expert, Department of Agriculture,
Sydney.
Lienau, Capt. C. H. A., 23 Victoria Avenue, Unley Park.
Lendon, Master Alan, C/o. Dr. A. Lendon, North Terrace,
Adelaide.
Macgillivray, Dr. Wm., Broken Hill.
Mellor, J. W., Fulham.
Melrose, R. T., "Rosebank", Mount Pleasant.
Minchin, A. C., Director, Zoological Gardens, Adelaide.
Morgan, Dr. A. M., North Terrace, Adelaide.
Morgan, W. M., C/o. Dr. A. M. Morgan, North Terrace,
Adelaide.
Osborne, R. E. P., Avenue Road, Clarence Park.
Parsons, F. E., National Mutual Life Buildings, King William
Street, Adelaide.
Pulleine, Dr. R., "Netherby", Mitcham.
Rischbieth, C. F., Glenelg.
Rymill, A. G., Brougham Place, North Adelaide.
Shields, H. D., Melrose.
Souter, T. G., Victoria Street, Goodwood.
Weidenbach, W., Glen Osmond.
White, H. L., "Bell Trees," Scone, N.S.W.
White, Wm., Fulham.
Welfare, J. H., "Sondamere". Semaphore.

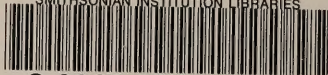








SMITHSONIAN INSTITUTION LIBRARIES



3 9088 00986 9330